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ABSTRACT

The report documents the follow-up of mentally retarded school completers in the Pittsburgh (Pennsylvania) area, begun with parents/guardians of students who completed their special education programs in 1985-86 (N=73) and also in 1986-87 (N=60) and preliminary follow-up of a 1990 cohort (N=102). Findings for the first two groups are reported in terms of living arrangements, work situations, competitive employment, training and placement, work histories, and physical and emotional disabilities. The 1990 cohort is discussed in terms of living arrangements, work situations, job placements, post-school training, parent/guardian involvement in transition planning, and comparison with other cohorts. Numerous tables detail the findings. Major conclusions from findings for the first two groups are a lack of progress in the participants' circumstances both for work (only 32 percent are in competitive work) and living arrangements (73 percent live with parents or guardians) and a dominance of traditional service options. Implications for transition programs are drawn. Findings for the 1990 cohort include 91 percent living with parents or guardians and work placements arranged for 64 percent. No substantial difference was found between the 1990 and earlier cohorts in living, working, and training situations. Includes 32 references and an appendix describing transitional services at the Allegheny Intermediate Unit. (DB)

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FOUR YEARS OF FOLLOW-UP OF MENTALLY RETARDED SCHOOL COMPLETERS

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INTRODUCTION

The 1990 HWPA/CRA project underwritten by the Edith L. Trees Charitable Trust has allowed us to expand our horizons in a number of ways. First of all, we have continued our follow-up, begun in 1987, of mentally retarded (MR) school completers. Parents and guardians of youngsters who completed their educations in the Allegheny Intermediate Unit's (AIU) special education programs have been contacted every year. In 1987, we followed youngsters who had left the six special education centers of the AIU in the 1985-1986 school year. In 1988, we continued to study this 1986 cohort, and also began following the next year's group of youngsters, those who had completed school in 1986-1987. The 1987 group included not only those who had studied at the special education centers, but also mentally retarded youngsters who had been mainstreamed at area high schools in classrooms under the auspices of the AIU. These cohorts were again studied in 1989 and 1990. This year, then, marks the fourth year of follow-up of the 1985-86 completers, and the third for the 1986-1987 completers.

It is now that we begin to reap the benefits of a longitudinal study and the extreme efforts made to locate and interview study subjects. The very low rates of attrition of study subjects attained allows us understand the shape of these youngsters' lives in the years after they leave school. Our "youngsters" are now mostly 24 to 26 years old. We have observed them, and their parents and guardians, grappling with the transition from school to adult lives. Some have been more successful than others in achieving lifestyles with which they and their parents are satisfied. This is especially true in the area of work - the sample ranges from those who have been idle since leaving school to those who have successfully completed job training and are now competitively employed in their areas of expertise. This year we were able to look at the shape of work careers over the four years of the study. Our analysis of post-school work histories gives added depth to our investigation of these youngster's lives. Our report of our original cohorts, then, includes this year's findings, an analysis of work histories, a number of conclusions, and implications for transitions drawn from these.

The second aspect of the research this year involves beginning to follow an additional cohort of youngsters, those completing school in the 1989-1990 school year. Mentally retarded youngsters from the special centers, and from mainstreamed classrooms in district high schools under AIU auspices, were included in the 1990 sample. Parents and guardians were queried as to their sons' and daughters' living arrangement and work involvement. Youngsters' work involvement while in school, during the summer immediately after leaving school, and planned for the fall, were all explored. Demographic data was also gathered. An additional focus of the parent

interviews was their involvement in transition planning. Following a new cohort of youngsters just as they are leaving school provides us with additional perspective on the school-to-work transition. It furnishes us with baseline data against which to measure future outcomes. It also brings us up to date with new developments and allows us to explore whether the last five years, during which transition received much attention, have made a difference in the post-school careers of mentally retarded young people.

The third area of exploration of this year's project developed out of the study findings. The consistent finding, year after year, that mentally retarded youngsters continue to live with parents indefinitely, prompted us to investigate a number of critical areas. We felt it was important to determine what was available around the country in two related fields. The first was family support services, which are directed at meeting the needs of families with a mentally individual member for such things as respite care, homemaking, recreation and family counseling. The second was innovative residential options that are positive environments for their residents, and meet parents' high standards for acceptable housing. We knew that these were both areas of recent growth and expected new developments in each to be apparent. We accordingly mounted a nationwide search for materials on principles, programs and practices in family support services and residential options. We concentrated on those that were innovative, and those that served the severely impaired. We received a wealth of material that indicated that programs are in evidence, and, perhaps, more importantly, that new definitions of best practice are coming to characterize these fields.

The present report, then, includes the first two aspects of this year's project, each in its own section. The first section describes the follow-up of the original cohorts. The second details the study of the 1990 school completers. The third aspect, exploring new options in support and residential alternatives, is presented in a separate volume.[1]

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[1] Gordon, Elizabeth (Community Research Associates), Family Support Services and Residential Options for the Mentally Retarded Youth in the U.S.: New Service Paradigms and Models, The Health and Welfare PLANNING Association, Pittsburgh PA., November, 1990.

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FOUR YEARS OF FOLLOW-UP OF MENTALLY RETARDED SCHOOL COMPLETERS

FOUR YEARS OF FOLLOW-UP OF MENTALLY RETARDED YOUTH

EXECUTIVE SUMMARY

This report marks the fourth consecutive year of follow-up of mentally retarded (MR) school completers begun in 1987, and continued in 1988 and 1989. Parents and guardians of youngsters who completed their educations in the Allegheny Intermediate Unit's (AIU) special education programs in 1985-1986, and in 1986-1987, were contacted. The 1985-86 group was followed for the fourth year; the 1986-87 for the third. As in previous years, information was gathered on youngster's present living and work situations, and job and training program involvement over the past year. Findings include a longitudinal look at work histories since leaving school. The report presents a number of conclusions and implications for transition, as well as study findings, both summarized and in detail.

CONCLUSIONS

Lack of progress: The major finding of the study is the lack of progress in the circumstances of the group. The living and work situations of the sample from last year to this is characterized by a lack of change. No progress towards better outcomes is in evidence. It appears that greater productivity and independence is not a concomitant of increased time out of school for MR school completers.

The dominance of traditional service options: The living and work situations of the sample, especially the TMRs, are dominated by traditional choices. We see little evidence of the new vocational and residential options being described in the literature. It is important to recognize how little these new developments are affecting certain groups and how entrenched supposedly outmoded services are; at least in some locales, traditional services are being relied on almost exclusively.

IMPLICATIONS FOR TRANSITION

Study findings for different groups within the sample have implications for their transition needs. A number of these were discussed and summarized:

TMRs: Initially, perhaps, ensuring enough WAC and sheltered workshop placements. Eventually, reconsideration of appropriate placements, working towards those that are community-, rather than facility- or agency-based.

EMRs: On-going, long term transition supports, for 5 - 8 years after leaving school that would: monitor work

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placements, suggest and arrange additional ones.

Individuals with additional handicaps: Increased coordination between agencies to better serve their individual needs.

Mainstreamed youngsters: Special attention - They can fall through the cracks, having difficulty locating resources that are aware of their unique transition requirements.

Hard-core idle: Intensive, personalized efforts to reach the 20%-33% of each cohort that has limited work involvement once they finish school.

Job training: The importance of post-school job training is stressed. Continued efforts to develop and locate suitable programs, and encourage enrollment and completion by mentally retarded school completers, are suggested.

SUMMARY OF FINDINGS

Living Arrangements: As we have found consistently, the majority of our sample lives with parents or guardians: 73% of the non-SPMRs remain in this arrangement, 11% live independently, 8% in a CLA or group home, and 5% in an institution. Almost all of those living independently are EMRs. The sample has a total of 12 children. There were few changes in living arrangement over the past year and no movement towards more independent living.

Work Situations: In a picture almost identical to that of last year's, we find the total non-SPMR sample in a number of work-related situations. 32% are in competitive work, 26% are in activities centers, 12% are in sheltered workshops, 26% have no work-related activity, 1 person is in training. 52% of EMRs are in competitive work. TMRs are most frequently found in activities centers, 50%. 15% of TMRs are in sheltered workshops.

Competitive Employment: 90% of the competitively employed are EMRs. Food service continues to be the most important employment sector, retaining 34% of the study's workers. 20% work in health care institutions. 22% work as janitors, 12% as dishwashers, 7% as nurse's aides, and 5% each as laborers and stock clerks.

Training and Placement: 12% of the non-SPMR sample have completed post-school training programs. 33% were trained as nurse's aides, 33% as janitor/custodians. 82% of those who completed training are currently working, most in the fields in which they were trained. Training appears to be an important factor in employment for center completers. 83% of center EMRs and SED/LAPs who received post-school vocational training have jobs, compared with 38% of those who didn't.

Work Histories: This year, we explored the work histories of the

TMR and EMR youngsters since leaving school, mapping out their work-related placements for each year they have been followed. We then, looked at four years of work activity for the 1986 cohort and 3 years for the 1987 cohort. We found contrasting patterns of placement and continuity for the TMR and EMR groups.

TMRs: Work histories are characterized by: 1) early placement, usually immediately upon completing school or within one year afterward, 2) few additional placements in subsequent years, 3) no movement into more challenging work situations, 4) long periods of idleness for those who are not placed immediately. 63% remain in the placements they attained within one year of leaving school, 21% have had no placement.

Center EMRs: Work histories are characterized by multiple transitions. Only 23% have retained their initial post-school placement. The majority, 55%, have had two or more placements since completion. The remaining 21% have had either sporadic jobs or long periods of idleness.

Mainstreamed EMRs: Work careers are marked by an even greater degree of irregularity of placement. Initial post-school placements have remained permanent for only 16%. Half have had at least three different work situations in the three years since leaving school. 25% have been idle for most or all of that time.

Physical and Emotional Disabilities: We explored the situation of those individuals who have a physical and/or emotional disability in addition to their mental retardation. We found that TMRs with additional disabilities are somewhat more likely to be found in institutions (27%) and CLAs and group homes (18%) than those without additional handicaps. They are somewhat less likely to live with parents or guardians (55%) than the remainder of the TMR group (82%). EMRs with additional disabilities are somewhat less likely to live independently, and somewhat more likely to live in institutions than the general group of EMRs. The differences in living situation are not significant. The work situations of the TMRs with additional disabilities do not differ significantly from those of other TMRs.

The differences in work situation of EMRs with additional disabilities appear more marked. Activities center is the most common placement for dually-handicapped EMRs. Fewer are in competitive employment (21% vs. 56%) and more in activities centers (36% vs. 8%) than EMRs without additional handicaps. The difference in percent competitively employed between EMRs with and without additional disabilities is statistically significant.

CONCLUSIONS

The "youngsters" we have been following are now mostly between 24 and 26 years old. Their story remains virtually unchanged. The circumstances of these mentally retarded school completers in 1990 are largely what they were in 1989. Focusing on the total sample, except for the most severely handicapped SPMRs, we find: Most live with parents or guardians. About a third, almost all of whom are EMRs, work competitively. 38% are in activities centers or sheltered workshops. Over a quarter have no work-related activity.

This section will discuss conclusions derived from the findings of the 1990 follow-up. Following will be a discussion of implications for transition which are based on study results and conclusions. Many of the issues raised in previous years remain salient - e.g. the ramifications of offspring living with parents indefinitely - and will not be repeated here. The reader is referred to the 1988 and 1989 reports for full discussion of these (Gordon and Goldbach, 1989; Gordon, 1988)[1].

Lack of progress: The major finding of the study this year is the lack of progress seen in the circumstances of the group as a whole. The living and work situations of the sample from last year to this is characterized by a lack of change. Certainly, no progress towards better outcomes for the group is in evidence. It is almost eerie how the numbers tend to balance - for every individual who has moved to a less restrictive living or work situation, there has tended to be another individual in the same cohort who has moved in the opposite direction. The net effect on the sample, then, is nil. Growth towards increasing independence or challenge is, accordingly, not seen for this group. It is an important realization that no natural progression exists in which these youngsters' circumstances improve with time: greater productivity and independence is not a concomitant of increased time out of school for MR school completers.

Comparison of the situation of the 1987 and 1986 center completers: The survey found that the circumstances of 1987 center completers are worse than those of 1986 completers. It is important to take a close look at this finding, to see whether it refutes the above conclusion as to lack of progress over time.

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[1] And also, the companion report published this year, which was inspired by the study's findings, and a desire to determine what innovative options for support and residential services for the mentally retarded are available around the country (Gordon, 1990).

The situation of both 1987 center groups, TMR and EMR, is worse than that of their 1986 counterparts. A full 39% of the 1987 TMR cohort is presently idle, compared with 16% of the 1986 cohort. 43% are in activities center, in contrast to 56% of the 1986 cohort. The 1987 center EMR group is similarly faring less well than its 1986 counterpart. Only 36% are competitively employed, compared with 1986's 64%. A higher percent of the 1987 EMR group than the 1986 group are idle, 32% vs. 14%., and are in sheltered workshops or activities centers 28% vs. 17%.

It must not, however, therefore be concluded that the passage of an additional year is what makes the fortunes of the 1986 cohort better than that of the 1987. It would be erroneous to conclude that better outcomes is a matter of time, and that, accordingly, the 1987 completer group will enjoy better circumstances next year. A look at the work histories of the two groups quickly disproves this notion:

TMRs: The majority of the 1986 TMR group, 76%, had achieved their current placements by the end of their first year out of school, 1986-87. Only 3 people were placed subsequently. 58% of the comparable 1987 group had been placed by the end of their first year out of school, 1987-88, with only 2 people placed subsequently. If we look at this past year, 1989-90, only one TMR individual, from the 1986 cohort, was placed in an activities center or sheltered workshop, and three people lost such placements and are now idle. Two explanations for this appear likely: 1) The period immediately as students leave school, up to the end of the first year, is a critical one for achieving placement for TMRs. Rate of placement sharply declines thereafter. For whatever reason, the 1986 group was more successful in getting placed during this critical period than was the 1987 group. This difference persists and largely explains the differential rates of involvement seen presently.
2) Cutbacks in services have been felt in recent years. It is likely that the 1987 TMR group experienced the effects of the cutback to a greater degree than the 1986 group, most of whom were placed in 1986-87. Since then, openings in county services have been more scarce. We know that, presently, capacity in county services is being "reduced through attrition", with non-residential services, including WACs and Sheltered Workshops, being reduced 6% (Firth, 1990). We also know, from our interviews with parents, that members of the 1987 TMR cohort are currently on waiting lists for openings at activities centers. It is likely that many from this group will continue to wait for long periods until openings occur. Both explanations are thus, apt to be valid: the period immediately after a TMR student leaves school <u>is</u> likely a critical time to achieve placement, and cutbacks in services <u>are being felt</u> more strongly in recent years.

EMR: Should the additional year out of school be the critical factor in the better fortunes of the 1986 than the 1987 EMR center groups, significant numbers of the 1986 group would

have had to have obtained jobs in the past year, 1989 to 1990. The work histories of this group indicate that this is not so - a net gain of only one job is seen between 1989 and 1990. (Two individuals are working this year who were idle at last year's interview; one is idle this year who was working last year.) The difference between the two EMR center cohorts is then, not the passage of additional year out of school. The disparity may be partially explained by differences in post-school training and outcomes in the two groups. Study findings indicate that training is an important factor in employment for center completers. 32% of the 1986 center cohort, 7 out of 22 members, completed post-school job training. This contrasts with the 4 out of 25 individuals, 16%, who did so from the 1987 group. Also, 1986's trainees appear to have been more successful in finding work than those of 1987. All of those who completed training from the 1986 group are currently employed, compared with 50%, 2 of 4 trainees, from 1987. It is clear that it is not the additional year out of school that has made the difference in the 1986 cohort's higher percent in competitive work and lower percent unemployed, compared with that of the 1987 cohort. Rather, findings suggest that factors related to characteristics of the individuals themselves, and their post-school experiences, contribute to the contrast in outcomes.

The conclusion that time is at best neutral for these youngsters, and certainly does not bring improvement, is maintained. We, therefore, cannot rest on the supposition that things improve each year, that better circumstances are just a matter of time for these youngsters, and that the system is fine as it is.

The dominance of traditional service options: The living and work situations of the sample, especially the more impaired TMRs, are dominated by traditional choices. TMRs are characteristically found in activities centers (50%) and sheltered workshops (15%). (The work history charts for this group are practically monochromal, being dominated by the pattern code for "Work Activity Center/Sheltered Workshop".) 15% of EMRs are also in activities centers and sheltered workshops. Independent living and competitive employment are realistic alternatives largely for EMRs. We see little evidence in our sample of the supported work options we explored in 1987 (Gordon, Goldbach and Katz, 1987) or the community living ones we looked at this year (Gordon, 1990).

Our sample, then, seems to be affected by old choices in terms of its living and work situations. With all the emphasis on supported employment and community living that is currently dominating the literature, with the stress on these program's applicability to all irrespective of ability level, we find our youngsters' lives determined by the traditional choices that have been around for a long time. This is especially true for individuals classified TMR who tend to live at home, waiting for openings in agency-based activities centers, or, less frequently,

sheltered workshops, and to remain in those placements once they have obtained them. This is a far cry from the dynamic picture being painted by the experts in the field, who describe options at the cutting edge that are supposedly becoming widespread, especially in supported work.[2] According to many experts, placements such as we are seeing as characteristic of our sample, especially the TMRs, are passe. They are considered no longer appropriate. Reading the literature, one might have the impression that they are being phased out.

It is, perhaps, one of the major contributions of a long-term follow-up study such as this, to remind those concerned of how little these new developments are affecting certain groups and how entrenched supposedly outmoded services are; that, at least in some locales, traditional services are being relied on almost exclusively. (Also, it should be noted, our sample is comprised of young people. If people in their 20's are not being recruited for, and taking advantage of, new options, who is?) We clearly found that the choices open to those in our sample whose lives are shaped by service systems are largely traditional ones.[3]

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[2] Please see references such as: Brotherson el al, 1988; Elder, 1988; Hill et al, 1987; and Wehman, 1988 for discussion of new vocational opportunities for the mentally retarded.

[3] In making such statements we are not trying to point a finger. This research does not allow determination of "fault" to be made - to what extent parents, transition services, schools, service agencies, funding streams, etc. have contributed to the status quo. The research is not equipped to ascertain this, and such exploration is, in any event, not likely to be fruitful. Rather, the point is to become aware of the distance between present reality and desired new advances, and not to assume that necessary changes have been effected.

IMPLICATIONS FOR TRANSITION

Study findings for different groups within the sample have implications for their transition needs. This section will discuss these in terms of a number of groups, summarizing the relevant points below. Please refer to the Appendix for a description of transition services at the Allegheny Intermediate Unit.

TMR

TMR work histories are marked by waiting for placement in activities centers and sheltered workshops, and once being placed, by an almost excessive stability; a lack of movement in which the individuals remain in placements indefinitely. The TMRs reliance on agency-based placements also makes them especially vulnerable to retrenchment; to waiting long periods when openings become scarce. A number of different transition strategies for this group, on a number of levels, appear necessary. In the short run, concern might focus on the effects of cutbacks in services, the fact that individuals are currently having to wait long periods for openings in the agency-based services that they traditionally utilize. An immediate attempt to deal with this would be to actively campaign for, and attempt to ensure, the continued availability of such slots on a timely basis. In the longer run, however, transition planning for TMRs might involve considerable review and revision. Those at the forefront of the field would view the existing reliance on service-based facilities as inappropriate. The fact that individuals remain in these placements indefinitely, and, especially, that young people coming out of school continue to be placed primarily in these situations (when space is available), would be viewed as not being congruent with the latest thinking: "Recently described professional expectations . . . hold that most persons who are mentally retarded can effect transition into the mainstream of employment." (Hill et al, 1987) Transition planning for TMR will eventually have to grapple with this, reevaluating current vocational goals in the light of increased expectations.

It is likely that supported work will have to be explored as a viable option for this group, as is being proposed in the literature, and the implications of this, in terms of available services and conversion of existing facilities, will have to be considered. The stability in the work histories of this group that we are seeing may be appealing to some, carrying with it a sense of permanence, security and lack of upset. It can, however, also be stifling if it entails young people being placed into low-level situations on a permanent basis, whose appropriateness is never reevaluated.

EMR

The work histories of the EMRs teaches us something further about optimum transition planning for this group. The checkered careers of many from the EMR cohort, moving into and out of placements, even after 3 and 4 years out of school, suggests that transition needs to be ongoing, that it is better formulated as a process than as a one-time placement. Transition from school to work needs to include ongoing monitoring of youngsters in their work or training situations, and being available if and when alternative situations seem preferable. Individuals and their families appear to need ongoing transition support; an address they can turn to for help for at least five years after the youngster is out of school. Also, should other groups, such as TMRs, eventually be placed in more ambitious, community-based work situations, they would also require on-ongoing transition support and resources. It is only now, when limited options mean that placement is permanent, that transition for TMRs can be a one-time event. Changing options for TMRs and others will likely mean that their careers will lose their extreme stability and will come to more closely resemble those of the EMRs, with changes of placement, and movement in and out of jobs as better opportunities arise. Transition planning and resources will, accordingly, have to change to be effective in meeting the need for ongoing support.

Youngsters with Additional Handicaps

It appears that special efforts need to be made for those individuals with mental retardation who have additional physical and emotional handicaps. Study findings indicate that significantly fewer EMRs with additional handicaps are competitively employed and that their most frequent placement is activities centers. The supported work initiative stresses that severity of disability and the presence of additional handicaps should not be impediments to obtaining jobs. In reality, however, this appears, not to be the case.

These youngsters are in an ambiguous position. The presence of an additional handicap can make finding suitable living and work situations more difficult. It does, however, usually entitle them to additional supportive resources. In our sample, for example, there are youngsters being served by such agencies as the Pittsburgh Blind Association and United Cerebral Palsy. Perhaps there is call here for additional coordination between the MR system and agencies serving those with these specific handicaps, to create support and programming that will better meet their individual needs.

Mainstreamed Youngsters

The mainstreamed youngsters in our sample are in one of two alternatives in terms of work placement: competitively employed (58%) or idle (33%). Their work histories are noted to be especially sporadic and changeable; more likely than those of other groups to entail numerous job placements and periods of idleness. The life circumstances of the mainstream cohort are apt to be different from those of center-based youngsters. They are more likely to be living independently, to be married, and to have children. They are likely not to have had transition resources geared to their needs available to them in secondary school. They may be ineligible for, or may avoid using, services to the handicapped. A limited range of post-school vocational alternatives is appropriate for them; primarily competitive work or job training. These facts all suggest that mainstream youngsters require unique consideration in terms of transition. They are apt to fall through the cracks - not fitting into vocational training services for the mentally retarded, while having difficulty with generic vocational services and programs.

The Hard-core Idle

There appears to be a core of individuals from every cohort, ranging from 1 in 5 to 1 in 3, that have notably limited work involvement. They may have had no work-related placement at all since leaving school, or careers that are marked by numerous placements, sporadic work and periods of idleness. For the transition of mentally retarded school completers to be more effective, it must include increased efforts to reach these youngsters. This would likely entail focusing more closely on such individuals, exploring why they are not in placement and developing strategies to better meet their individual needs. This undertaking is apt to be especially challenging as we have seen in our research that the reasons that these young people are not working are often particularly idiosyncratic. Parents' explanations for youngsters' not working include drug and alcohol problems, physical and mental difficulties, severity of impairment, tenure on waiting lists, laziness, car accidents,and caring for young children.

Summary: Transition Strategies for the Mentally Retarded

1) Initially, perhaps, ensuring enough WAC and sheltered workshops placements for TMRs.

2) Reconsideration of appropriate placements for TMRs and others, working towards those that are community-, rather than facility- or agency-based.

3) On-going, long term transition supports, for 5 - 8

years after leaving school that would: monitor placements once they were made; remain cognizant of and make clients aware of alternatives as they arise; be available to suggest and arrange additional placements should initial ones not work out, for whatever reasons.

4) Increased coordination between appropriate agencies to better serve the transition needs of mentally retarded youth with additional disabilities.

5) Consideration of the special transition needs of mainstreamed youngsters, whose life circumstances and appropriate vocational alternatives may be similar to those of nondisabled youngsters. These individuals may have difficulty locating resources that are aware of and make allowance for, their unique transition requirements.

6) Recognition of the importance of post-school job training in obtaining competitive employment. Continued efforts should be made to develop and locate suitable programs, to encourage mentally retarded school completers to enroll, and to help them successfully complete programs.

7) Intensive efforts to reach the hard-core idle, the 20%-33% of each cohort that has notably limited work involvement once they finish school.

SUMMARY OF FINDINGS

This report marks the fourth consecutive year of follow-up of mentally retarded (MR) school completers begun in 1987, and continued in 1988 and 1989. Parents and guardians of youngsters who completed their educations in the Allegheny Intermediate Unit's (AIU) special education programs were contacted. Two cohorts of youngsters were followed: those who completed school in the 1985-1986, and in the 1986-1987 school years. The former group, thus, was studied for the fourth year; the latter for the third. Youngsters with an MR involvement of any degree who had completed their educations at one of the AIU's special education centers in these years were followed. Also included in the cohort of 1986-1987 completers were youngsters who had been in mainstreamed MR classes under AIU auspices in regular area high schools. These individuals were all classified educable mentally retarded (EMR).

The questionnaire used to survey all respondents was an abbreviated version of that used in previous years. Basic questions, concerning the youngster's present living and work situations, and job and training program involvement over the past year, were retained. In addition, respondents were asked to indicate the subject's marital status and number of children, if any. Two new questions were added, asking parents and guardians to discuss any significant areas of progress or achievement, and any problems or setbacks, experienced by the youngster in the past year.

This section will summarize the study findings. It will include changes seen in the sample since last year and, in the case of work histories, the shape of work careers over the four years of the study. It is now that we begin to reap the benefits of a longitudinal study and the extreme efforts that were made to locate and interview study subjects, which resulted in the very low rates of attrition seen from year to year.

Living Arrangements

SPMR: Most of our SPMR school completers, 64%, are in institutions. A minority, 18%, live at home with parents or guardians. The only change we have seen in living arrangements over the past four years of the study occurred this year, when 2 youngsters who were living at home moved to institutions.

Total non-SPMR sample: As we have found in previous years, the majority of our mentally retarded school completers live with parents or guardians. 73% of the total non-SPMR sample remain in such living arrangements, a percentage identical to that found last year. 11% live independently, 8% in a CLA or group home, and 5% in an institution. Only among those who have an

additional handicap, PH/SED, is CLA or group home a considerably utilized arrangement, with 40% of such individuals living in these settings.

All but one of the 14 individuals who live independently are from the EMR cohorts; 50% are from the mainstreamed group. 43% of those living independently are single; the same percent are married. 7% percent each are living with a companion and in unknown independent circumstances. 5 of the 6 married individuals are from the mainstreamed cohort. The sample has a total of 12 children. 6 individuals have one child; 3 have two. 7 out of 14 of those living independently (50%) have children. 75% of those who are married have children.

EMR: When we look specifically at the largest exceptionality represented in our sample, the EMR's, we find that a full 75% continue to live with parents or guardians. This percent is identical to that found last year for this group. 18% live independently; alone, or with a spouse or roommate. 1% are in a CLA or group home, 3% in an institution and for 3%, living arrangements are not known. The 3 EMR cohorts differ somewhat in their living arrangements. The mainstream group is somewhat more likely to be living independently, 29%, and somewhat less likely to be living with parents or guardians, 71%. A full 80% of those young people who completed their educations in centers in 1987 live with parents or guardians; only one person (4%) lives independently. The 1986 center group falls somewhere between: 73% live with parent or guardian, 23% live independently.

TMR: The other group in our sample large enough to be considered individually, the TMR's, live in three types of living arrangements. 77% live with parents or guardians, 13% live in CLA's or group arrangements, and 10% live in institutions. None live independently. This breakdown is almost identical to that found last year.

Changes in living arrangements: If we look at changes in living arrangement for the total non-SPMR sample, the EMR group alone and the TMR group alone, we find few changes in arrangement and no movement towards more independent living. The few individuals who did change their type of residence were as likely to move to what would be considered more restrictive arrangements as they were to less restrictive environments. (i.e. Although there were some individuals who moved from their parents' homes to independent living arrangements, there were also those who made a move in the opposite direction, going from independent living arrangements to parents' homes.)

5 EMR's changed their living arrangement: one from the mainstream group moved from her guardian's home to an independent living situation; two from the same group who had been living independently moved back with parents or guardians. One center completer moved back to his family after living in a CLA, another moved to an institution after living independently. Only 2 TMR

individuals changed arrangements since last year: one moved from an institution to a CLA, the other moved from a CLA to an institution. If we consider the net changes in living arrangement for the entire non-SPMR group from 1989 to 1990 we find: 2 more people living with parents/guardians, 2 fewer living independently, one fewer living in a CLA, and one more in an unknown arrangement.

Work Situations

SPMR: The most severely disabled young people in our sample tend (89%) to be in activity centers, primarily TACs. The remaining 3 SPMR individuals (11%), living in institutions, are not in activity centers.

Total non-SPMR sample: In a picture almost identical to that of last year, we find the total non-SPMR sample in a number of work-related situations. 32% are in competitive work, the same percent as last year. 26% are in activities centers, up from 20% last year. 12% are in sheltered workshops, as compared with 15% last year. One individual is in training, as was found last year; 2 are volunteers. 26% have no work-related activity, similar to the 28% found last year. The work-related activity of 3% of the sample was unknown both years. The great majority (93%) of individuals working competitively are EMR's. Those with an additional handicap, PH/SED, show the greatest variety of work situations: 30% each are in activities centers and sheltered workshops; 20% are competitively employed; 10% each are in no activity and work as volunteers.

EMR: As was true last year, the majority of EMR's, 52%, are employed in regular jobs. This year, no one is in supported employment; the two individuals in such positions last year are no longer in these jobs. A substantial minority, 27% have no work-related activity, a percentage which has remained constant since last year. The remainder of the EMR group is in sheltered workshops (7%), or activities centers (8%). The percent of EMR's found in these placements last year were 9% and 4%, respectively. One individual is presently in training.

The three EMR cohorts differ in terms of present work situation. The 1986 center cohort has a higher percentage working, 64%, and a lower percentage with no activity, 14%. Fewer individuals in the 1987 center cohort are working, 36%, and more are in sheltered workshops and activities centers, 28%. Nearly a third, 32%, of this cohort are idle. Individuals in the mainstream group fall mainly into two categories; 58% are competitively employed, one third are idle. One individual is in business training, none are in sheltered workshops or activities centers. We can see, then, that both 1987 cohorts have a significant percent who are idle, about 1/3, as compared with the 1986 cohort's 14% with no work-related placement.

TMR: As we have found consistently, the most common work activity situation of the TMR's is activities center, with half in this placement. Over a quarter, 27%, have no work-related activity. (Last year, the percentages were 48% and 27%, respectively.) An additional 15% are in sheltered workshops this year and 4% are in jobs, compared with 19% and 4%, respectively, for last year. (The same two TMR individuals have been in competitive employment since they left school.) The two TMR cohorts are notably different in distribution as to work placement, with the 1986 group doing considerably better. The most striking difference between the two groups is the 1987 cohort's 39% idle, as compared with 1986's 16% in this category. An additional difference is that 56% of the 1986 cohort is in activities center and 2 (8%) are working, compared with 1987's 43% in activities centers and none working.

Changes in work situation: An examination of the changes in work situation for the total non-SPMR cohort from 1989 to 1990 reveals no movement to more challenging work placements for the study subjects. Similar to the situation described for living arrangement, above, changes which were in the direction of increased challenge were offset by those in the opposite direction. For example, if we focus on changes seen in the EMR group, we find that 8 individuals gained jobs this year. 6 of these individuals had been idle last year, one had been in a sheltered workshop and one's previous work situation was unknown. However, 8 other EMR individuals lost jobs they held last year. 6 of these are idle this year, one is in a training program and one was placed in an activities center. The 4 TMR's who changed work situation since last year exhibit a more discouraging pattern. One of these went from being idle to placement in an activities center. The remaining three went from sheltered workshop or activities center to no work activity. The net changes in work situation for the total non-SPMR sample were: the addition of one individual in training and three in activities centers, and the loss of four individuals in sheltered workshops.

Competitive Employment

Present employment: Because competitive employment is viewed as the optimal placement for school completers, we generally look closely at these work situations and the individuals who achieve them. This year we find that 32% of our non-SPMR sample are competitively employed. 90% of competitively employed individuals are EMRs, both mainstream (34%) and center-based (56%). The remaining 4 individuals (9%) are also from the centers; two are classified TMR, 1 as PH and 1 as SED/LAP. All of these percentages are within 1% of being identical to last year's results.

Type of job: The food service sector continues to be the most important employer of the study's workers. 34% of workers have jobs in restaurants, fast food outlets and cafeterias. Another 20% work in health care institutions including nursing homes and hospitals. (Last year, 34% of workers were in food services, 23% in health care institutions.) In terms of type of work, 9 workers (22%), have jobs as janitors; 4 in health care settings, 5 in other milieu. Additional jobs held include dishwasher (12%), nurse's aide (7%), laborer (5%) and stock clerk (5%).

Training and Placement

Post-school training: 12% of the non-SPMR sample (15 individuals) have completed post-school training programs since leaving school. 73% of these were center completers; 27% were mainstreamed. A third of the youngsters who were trained completed nurse's aide programs; an additional third studied in janitor/custodian programs. The remaining third trained in a variety of fields including food service, clerical, commercial art and cooking. Only one individual is currently enrolled in a training program.

Jobs in field of training: 82% of those who completed programs are currently working (11 out of 15 individuals). 54% (6 of the 11) of these obtained jobs in the fields in which they were trained. Of the remaining 5 individuals who are employed, 2 are working in work settings related to their training, but are doing different work than that for which they trained; 3 are working in jobs totally unrelated to their training.

The importance of training for center completers: Training appears to be an important factor in employment for center completers. 83% of center EMRs and SED/LAPs who received post-school vocational training currently have jobs, compared with 38% of those who did not have such training. This difference is significant at $p=.013$. However, these results must be interpreted with great caution, as it is likely that those students who are more capable are more likely to enter training and to complete it successfully. It is, therefore, not possible to conclude that training *per se* increases employability. Rather, training may enhance employability for those students who have at least minimum ability levels.

Work Histories

This year, the third and fourth years of follow-up of relatively constant groups of subjects, allows us a unique opportunity to view the transition of these youngsters from school to post-school career over time. We explored the work histories of these youngsters since leaving school, mapping out

their work-related placements for each year they have been followed. We are, then, looking at four years of work activity for the 1986 cohort; 3 years for the 1987 cohort. This data was compiled for the 2 major exceptionality groups - TMR and EMR.

TMR: The work histories of all 48 TMRs indicate that:

* 40% are in the same placement they have been in since leaving school;

* 23% are in placements into which they were placed during their first year out of school;

* 10% are in placements into which they were placed in their second or third years out of school;

* 21% have had no placement since leaving school.

* 6% (3 individuals) had placements at one time, but are currently idle.

Center EMR: The work histories of the 47 Center EMRs demonstrate that:

* 23% remain in the same work placement they have had since leaving school;

* 38% have had some type of work activity during most of the post-school careers, but have had at least 2 different placements during that time. Almost all began placements during their first year out of school, but changed placements subsequently. All but three are currently in a work-related situation.

* The work histories of an additional 17% of the center EMRs are more sporadic. Although all but one are currently working, their post-school careers have been marked by periods of idleness, sporadic employment, and/or numerous placements.

* The final 21% of the center EMRs have had little work experience since leaving school, and have been idle for long periods, often two or more years.

Mainstreamed EMR: The work histories of the 24 mainstreamed EMR indicate that:

* 16% remain in their initial post-school placements of 3 years ago.

* 25% have been in work or training much of the time since leaving school, but have had a change of placement in that period. They have moved from training to work, or from one job to another. All but

one are currently working.

* For 33% of the mainstreamed EMR's, work histories are marked by sporadic employment, discontinued training programs and idle periods. Six of the 8 persons in this group are currently in jobs, all of which are new placements begun this year.

* The work histories of the final 25% of the mainstreamed EMRs are characterized by very limited or sporadic work involvement, long periods of idleness and no known work placement at present.

Summary of work histories: We see contrasting patterns of placement and continuity for the TMR and EMR groups. The following elements characterize the pattern for the TMRs: 1) Early placement, usually immediately upon completing school or within one year afterward, 2) Few additional placements in subsequent years, 3) No movement into more challenging work situations, such as competitive work, 4) Long period of idleness for those who are not placed immediately. 63% of TMRs remain in the placements they attained within one year of leaving school, 21% have had no placement since leaving school.

The work histories of the Center EMRs are characterized by multiple transitions. Only 23% have retained their initial post-school placement. The majority, 55%, have had two or more placements since completion (e.g. from training to work, from one job to another). The remaining 21% have had either sporadic jobs, or long periods of idleness.

The careers of many of those in the mainstreamed group are marked by an even greater degree of irregularity of placement. Initial post-school placements have remained permanent for only 16%. Half have had at least three different work situations in the three years since leaving school. 25% have been idle for most or all of that time.

Physical and Emotional Disabilities

This aspect of the findings explores the situation of those individuals who have a physical and/or emotional disability in addition to their mental retardation. There were 25 such school completers in the sample. About half were classified as being socially and emotionally disturbed (SED) or having learning and adjustment problems (LAP), the other half have one or more physical handicaps (PH), including blindness and visual difficulties, deafness or hearing problems, seizures or cerebral palsy. These individuals were divided into TMR and EMR groups, depending on their level of MR involvement. Their living and work situations were compared with those of individuals with comparable MR involvement, TMR or EMR.

Living arrangements: TMRs with additional disabilities are somewhat more likely to be found in institutions (27%) and CLAs and group homes (18%) than TMRs without these additional handicaps (8% and 10%, respectively). They are somewhat less likely to live with parents or guardians (55%) than the remainder of the TMR group (82%). EMRs with additional disabilities are as likely to live with parents or guardians (74%) as the general group of EMRs (74%). They are somewhat less likely to live independently (7% vs. 15%), and somewhat more likely to live in institutions (14% vs. 3%). These differences in living arrangements for the TMR and EMR groups are not significant.

Work situation: The work situations of the TMRs with additional disabilities do not differ significantly from those of other TMRs. They are somewhat more likely to have no work activity (33% vs. 26%), and somewhat less likely to be found in activities centers (42% vs. 49%), in competitive work (0% vs. 5%), and in volunteer work (0% vs. 5%). The differences in work situation of EMRs with additional disabilities appear more marked. Fewer are in competitive employment (21% vs. 56%) and more in activities centers (36% vs. 8%) than EMRs without additional handicaps. Activities center is the most common placement for the dually-handicapped EMR group. The percent of those with no work activity is the same for EMRs with additional disabilities as it is for those without such additional disabilities, 21%. The difference in percent competitively employed between EMRs with and without additional disabilities is significant at p.= .024. EMRs with additional physical and emotional handicaps are, thus, significantly less likely to be competitively employed than EMRs without these handicaps.

FOUR YEARS OF FOLLOW-UP OF MENTALLY RETARDED SCHOOL COMPLETERS

This report marks the fourth consecutive year of the follow-up begun in 1987, and continued in 1988 and 1989, of mentally retarded (MR) school completers of the Allegheny Intermediate Unit's (AIU) special education programs. (Gordon, Goldbach and Katz, 1987; Gordon, 1988, Gordon and Goldbach, 1989). Two cohorts of youngsters have been followed: those who completed school in the 1985-1986 and in the 1986-1987 school years. The former group, thus, was studied for the fourth year; the latter for the third. Youngsters with an MR involvement of any degree who had completed their educations at one of the AIU's special education centers in these school years were followed. Also included in the cohort of 1986-1987 completers were youngsters with an MR disability who had been in mainstreamed classes under AIU auspices in regular area high schools. These individuals were all classified educable mentally retarded (EMR). In that they were mainstreamed, these youngster were considered, in the main, less handicapped and better able to be integrated than their peers in the special education centers.

The Study Subjects

Center completers: Center completers finished their educations at the six special education centers of Allegheny Intermediate Unit during the 1985-1986 and 1986-1987 school years. These centers, located around the county, serve the handicapped children of the school districts of suburban Allegheny County which are under the auspices of the Allegheny Intermediate Unit. Less disabled youngsters, and those judged able to handle integration with nondisabled peers, are mainstreamed into district schools. The centers, then, serve the more severely disabled, those with multiple handicaps, those with emotional problems as well as developmental delays, and those otherwise unable to be integrated into a mainstreamed setting. The study population was comprised of all students who left school in the identified year who had any degree of mental retardation (MR), whether as a primary or secondary disability. While in school, the youngsters were classified into exceptionality groups using state standards. Although also based on functional ability and thus, having a 5% leeway, the major groups are determined by I.Q.: Severely Profoundly Mentally Retarded (SPMR) - I.Q. 25 and below; Trainable Mentally Retarded (TMR) - I.Q. range roughly 25+ to 50; Educable Mentally Retarded (EMR) - I.Q. range roughly 50+ to 80. Additional groups are Physically Handicapped (PH), and Social or Emotional Disabled/Learning and Adjustment Problem (SED/LAP). Our study sample only included PH and SED/LAP individuals who were also mentally retarded to some degree. Students who graduated, received a certificate or left school without official termination were all included in the follow-up.

Mainstreamed students: Mainstreamed students completed their educations in an EMR class under the auspices of the AIU, in one of 12 district high schools. These classes are physically located within a regular high school. These students typically have their own programming within the high school building, but may interact with non-handicapped peers in some non-academic classes, at lunch, extra-curricular activities, and in the normal flow in hallways. Students who graduated, or who left school without official termination at any time during the school year, were included.

Data Collection: Surveying Parents and Guardians

In a departure from the procedures used in previous follow-ups, the parents and guardians who responded in 1989 were initially sent a mail questionnaire. This procedure was used for two reasons: 1) it was considered less of an imposition upon the respondents, who had been patient and cooperative during previous studies; 2) it enabled us to test the effectiveness of the tracking system when applied to a mail survey.

The phone numbers and addresses of the parents and guardians, originally taken from school records and roster lists and updated each year, were again checked for accuracy against listings in telephone directories and Cole's Street Directory. Parents and guardians for whom address information was available were mailed a one-page, two-sided questionnaire, an explanatory letter and a postage-paid return envelope. When mailed surveys were returned due to address corrections, the changes were recorded in the computer file and the survey was retransmitted. Of the 156 surveys mailed in this first phase of the data collection, 89 were completed and returned. These 89 respondents constituted 55% of the total sample.

Phone interviews were conducted if any of the following situations occurred: 1) the mail survey was not returned; 2) current address information for the parent/guardian was not available; 3) the only known contact person was the supervisor of a Community Living Arrangement (CLA) or residential institution. Contacting parents and guardians was the first priority. If necessary, numerous callbacks, at different times of the day, and different days of the week, were made to the identified numbers. When necessary, interviews were rescheduled at the interviewee's convenience. In the case of youngsters in group living situations or Community Living Arrangements (CLAs), sometimes an individual in charge was interviewed, sometimes a parent, and sometimes both were interviewed.

The same questionnaire was used to survey all respondents. It was an abbreviated version of that used in previous years. Basic questions, concerning the youngster's present living and work situations, and job and training program involvement over the past year, were retained. In addition, respondents were

asked to indicate the subject's marital status and number of children, if any. Two new questions were added, asking parents and guardians to cite and explain any significant areas of progress or achievement, as well as any problems or setbacks, experienced by the youngster during the past year.

The Study Sample

* In total, 157 out of last year's sample of 163 cases were contacted and successfully interviewed, for an overall response rate of 96%. The response rate was the same, 96%, for the center and mainstream completers. (See table, next page, for response summary).

* Of the 6 lost cases, 2 were refusals, 2 had disconnected phones and expired mail forwarding, and 1 could not be reached despite continuous attempts over a period of several weeks. In another case, the subject was deceased.

* Of the 6 lost cases, 3 were center EMRs, 1 was mainstreamed, 1 was classified as SED, and the deceased individual was an SPMR. All of those classified as TMR or PH were retained in this year's sample.

* The loss of 5 cases from the two center cohorts had little effect on the racial configuration of the sample, which was 87% white last year and 89% white this year (data on race was not available for mainstream students).

* Five (83%) of the 6 lost cases were from low-income neighborhoods. Families in these areas have proven to be difficult to locate in each year of the study. The study sample, then, tends to be somewhat less representative of youngsters whose families are in the lower, than the higher wealth rating categories.

* The characteristics of all respondents are shown in the tables on pages 21 and 22.

RESPONSE SUMMARY - 1986 AND 1987 COHORTS

Type of response	#	(%)
Parent/guardian completed mail questionnaire	89	(54.6)
Parent/guardian responded to follow-up call	55	(33.7)
CLA supervisor responded to follow-up call	13	(8.0)
Parent/guardian refused to participate	2	(1.2)
Phone disconnected/mail undeliverable	2	(1.2)
Youngster is deceased	1	(0.6)
Never reached	1	(0.6)
	163	(100.0)

% responded by mail:	54.6
% reached by follow-up:	41.7
Total response rate:	96.3 %

THE 1990 STUDY SAMPLE FOR THE CONTINUED FOLLOW-UP
Center Completers, 1986 and 1987 Cohorts

	1986 Cohort (N=73)		1987 Cohort (N=60)		Total (N=133)	
	#	(%)	#	(%)	#	(%)
School						
Mon Valley	16	(22)	4	(7)	20	(15)
Eastern Area	4	(5)	6	(10)	10	(8)
Sunrise	7	(10)	12	(20)	19	(14)
Middle Road	24	(33)	17	(28)	41	(31)
Western Hills	14	(19)	11	(18)	25	(19)
Pathfinder	8	(11)	12	(20)	20	(15)
Primary Exceptionality						
EMR	22	(30)	25	(42)	47	(35)
TMR	25	(34)	23	(38)	48	(36)
SPMR	19	(26)	9	(15)	28	(21)
SED/LAP	4	(5)	2	(3)	6	(5)
PH	3	(4)	1	(2)	4	(3)
Race						
White	63	(86)	55	(92)	118	(89)
Black	8	(11)	5	(8)	13	(10)
Asian	2	(3)			2	(2)

THE 1990 STUDY SAMPLE FOR THE CONTINUED FOLLOW-UP
Center and Mainstream Completers

	1986 Cohort (N=73)		1987 Cohort (N=60)		1987 Mainstream (N=24)		Total (N=157)	
	#	(%)	#	(%)	#	(%)	#	(%)
Sex								
Male	52	(71)	37	(62)	17	(71)	106	(68)
Female	21	(29)	23	(38)	7	(29)	51	(32)
Birth Year								
1963	1	(1)	-		-		1	(1)
1964	26	(36)	-		-		26	(17)
1965	37	(51)	17	(28)	-		54	(34)
1966	4	(5)	32	(53)	-		36	(23)
1967	2	(3)	4	(7)	4	(17)	10	(6)
1968	1	(1)	2	(3)	15	(63)	18	(11)
1969	-		2	(3)	5	(21)	7	(4)
1971	1	(1)	-		-		1	(1)
Unknown	1	(1)	3	(5)	-		4	(3)

LIVING ARRANGEMENTS

SPMR: The current living arrangements of the 28 SPMR cases in the sample are shown in the table below. The majority (71%) live in institutions, 18% live with parents or guardians, and 11% live in group living arrangements or CLAs.

SPMR LIVING ARRANGEMENTS

Living Arrangement	1986 Cohort #	(%)	1987 Cohort #	(%)	Total #	(%)
Parent/Guardian	3	(16)	2	(22)	5	(18)
CLA, Group Home	3	(16)	-		3	(11)
Institution	13	(68)	7	(78)	20	(71)
Total	19	(100)	9	(100)	28	(100)

A few changes have occurred in the living arrangements of the SPMR sample since last year. Comparisons of 1989 and 1990 living arrangements appear in the table below. The table shows that while living arrangements stayed the same in 26 cases, change was evident in 2 others. Two individuals from the 1987 cohort moved from the homes of parents/guardians to institutions. These 2 cases mark the first time that changes in living arrangements have been noted within the SPMR sample since the studies began in 1987. It is notable that both changes involve institutionalization rather than de-institutionalization.

COMPARISON OF LIVING ARRANGEMENTS OF SPMRs, 1989-1990

1989 Living Arrangement		1990 Living Arrangement	Number of Cases	(%)
NO CHANGES			26	(93)
Institution		Institution	18	(64)
Parent/guardian		Parent/guardian	5	(18)
CLA, group home		CLA, group home	3	(11)
CHANGES			2	(7)
Parent/guardian	--->	Institution	2	(7)
TOTAL			28	(100)

Total non-SPMR sample: The table below presents the living arrangements for all other groups in the sample. Almost three-quarters (73%) of the total non-SPMR sample lives with parents or guardians and 11% lives independently, i.e., alone, with spouses or roommates or, in the case of one individual, in the Navy. Another 8% is living in group situations or CLAs, and 5% is institutionalized. Only for EMRs do we see a notable proportion living independently: 13% for center EMRs, 29% for individuals who were mainstreamed. The greatest proportion living in CLAs (40%) is found among those who are physically or emotionally handicapped (PH/SED). Those in the TMR group tend to live either with parents/guardians, or in group homes or institutions. The living arrangements of three persons was not known to the parent/guardian at the time of the interview.

NON-SPMR LIVING ARRANGEMENTS

Living Arrangement	Mainstream		Center						Total	
			EMR		TMR		PH/SED			
	#	(%)	#	(%)	#	(%)	#	(%)		
Parent/Guardian	17	(71)	36	(77)	37	(77)	4	(40)	94	(73)
Independent	7	(29)	6	(13)	-		1	(10)	14	(11)
CLA, Group Home	-		1	(2)	6	(13)	4	(40)	11	(8)
Institution	-		2	(4)	5	(10)	-		7	(5)
Not known	-		2	(4)	-		1	(10)	3	(2)
Total	24	(100)	47	(100)	48	(100)	10	(100)	129	(100)

At this point, 14 of the 129 non-SPMRs in the sample are reported to be living independently. As seen in the chart below, 7 (50%) of those living independently are members of the 1987 mainstream group. Another 6 are center EMRs, 5 from the 1986 cohort and 1 from the 1987 cohort. The final case is a physically handicapped center MR from the 1986 cohort.

EXCEPTIONALITY AND COMPLETION YEAR OF THOSE LIVING INDEPENDENTLY

EXCEPTIONALITY	YEAR COMPLETED	#	(%)
Mainstream EMR	1987	7	(50)
Center EMR	1986	5	(36)
Center EMR	1987	1	(7)
PH/MR	1986	1	(7)
TOTAL		14	(100)

Of the 14 living independently, 43% are single and 43% are married. Five of the 6 in the married group are mainstream EMRs.

These 5 comprise 72% of the mainstreamers who live independently. Only one center EMR is married; 3 are single, 1 is living with a companion, and the status of the sixth is not known. These findings are shown in the table below.

MARITAL STATUS OF THOSE LIVING INDEPENDENTLY

	EMRs							
	Mainstream		Center		PH/MR		Total	
Marital Status	#	(%)	#	(%)	#	(%)	#	(%)
Single	2	(28)	3	(50)	1	(100)	6	(43)
Married	5	(72)	1	(17)	-		6	(43)
Living with companion	-		1	(17)	-		1	(7)
Unknown	-		1	(17)	-		1	(7)
	7	(100)	6	(100)	1	(100)	14	(100)

Half of those who are living independently have at least one child. Five (36%) have one child; 2 (14%) have two children. Six (43%) have no children; for another, the number of children is not known. Two of the MRs who are single have at least one child; another who lives with a companion also has one child. There are a total of 9 children of the independent MRs.

NUMBER OF CHILDREN BY MARITAL STATUS OF MRs LIVING INDEPENDENTLY

	MARITAL STATUS									
	Married		Single		Companion		Unknown		Total	
Number of Children	#	(%)	#	(%)	#	(%)	#	(%)	#	(%)
None	2	(33)	4	(67)	-		-		6	(43)
One	3	(50)	1	(17)	1	(100)	-		5	(36)
Two	1	(17)	1	(17)	-		-		2	(14)
Unknown	-		-		-		1	(100)	1	(7)
	6	(100)	6	(100)	1	(100)	1	(100)	14	(100)

There are, in addition, two cases of individuals who have children, but whose living arrangements are not known. One is a married 1987 center EMR with one known child; the second is a married 1986 center SED whose two children are being cared for by her mother. Thus, the sample has a total of 12 children.

The discussion of living arrangements will now focus on individuals classified as EMRs and those classified as TMRs. As in past years of the study, the samples of PH and SED/LAP are

noted to be too small to permit individual discussion of specific variables.

TMRs: The TMRs live in one of three situations: with their parents or guardians (77%), in group arrangements or CLAs (13%), and in institutions (10%). None live independently. The two cohort groups show very similar distributions of living arrangements. For the 1986 group, the percentages in the three types of living arrangements are 76%, 16% and 8% respectively. For the 1987 group, they are 78%, 9% and 13% respectively. Figures for the TMR living arrangements are shown in the table below.

TMR LIVING ARRANGEMENTS

Living Arrangement	1986 Cohort #	(%)	1987 Cohort #	(%)	Total #	(%)
Parent/Guardian	19	(76)	18	(78)	37	(77)
CLA, Group Home	4	(16)	2	(9)	6	(13)
Institution	2	(8)	3	(13)	5	(10)
Total	25	(100)	23	(100)	48	(100)

Changes in living arrangements: Only one person in the TMR group has experienced a change in living arrangement since last year's study: 1 member of the 1986 cohort moved from an institution to a CLA. No changes in living arrangement occurred within the 1987 cohort. A chart comparing 1990 living arrangements with those of 1989 appears below.

COMPARISON OF TMR LIVING ARRANGEMENTS, 1989 AND 1990

1989 Living Arrangement	1990 Living Arrangement	Center 1986 #	(%)	Center 1987 #	(%)	Total #	(%)
NO CHANGES		24	(96)	23	(100)	47	(98)
Parent/guardian	Parent/guardian	19	(76)	18	(78)	37	(77)
Institution	Institution	2	(8)	3	(13)	5	(10)
CLA	CLA	2	(8)	2	(9)	4	(8)
CHANGES		1	(4)	-	-	1	(2)
Institution	---> CLA	1	(4)	-	-	1	(2)
		25	(100)	23	(100)	48	(100)

EMRs: 75% of EMRs presently live with parents or guardians, while 18% live independently. In addition, 1% are in CLAs, and 3% are in institutions. The living arrangements of another 3% are unknown. Examining the cohorts individually, we see that 73% of the 1986 center group lives with parents or guardians, 23% lives independently, and the situation of 1 (5%) is not known. The 1987 center group has an even higher percent living with family (80%), one person (4%) living independently, one person (4%) in a CLA, two (8%) living in an institution, and 1 (4%) unknown. Within the mainstream group, which also completed school in 1987, 71% is living with parents or guardians and 29% independently: alone, with spouse or with a roommate. These findings are shown in the table below.

LIVING ARRANGEMENTS OF CENTER AND MAINSTREAM EMRs

Living Arrangement	1986 Center #	(%)	1987 Center #	(%)	1987 Mainstream #	(%)	Total #	(%)
Parent/Guardian	16	(73)	20	(80)	17	(71)	53	(75)
Independent	5	(23)	1	-	7	(29)	13	(18)
CLA, Group Home	-		1	(4)	-		1	(1)
Institution	-		2	(8)	-		2	(3)
Not known	1	(5)	1	(4)	-		2	(3)
Total	22	(100)	25	(100)	24	(100)	71	(100)

Changes in living arrangement: The current living arrangements of the EMRs reflect minor changes from those found in last year's study. Interestingly, these changes do not demonstrate a trend toward independent living for the EMRs. Of the 71 EMRs, 5 (7%) experienced a change in living arrangement since last year. Within the mainstream group, one study subject moved from the home of her guardian to an independent living situation; however, two mainstreamers who had been living independently moved back with their parent/guardians. Among the center cohorts, one 1986 completer moved back to his family after living in a CLA; a 1987 completer is now living in an institution after having lived independently. The table on the following page provides a comparison of 1989 and 1990 living arrangements for all EMRs.

COMPARISON OF LIVING ARRANGEMENTS OF EMRS, 1989 AND 1990

1989 Living Arrangement		1990 Living Arrangement	Center 1986 #	(%)	Center 1987 #	(%)	Main-stream #	(%)	Total #	(%)
NO CHANGES			20	(91)	23	(92)	21	(88)	64	(90)
Parent/guardian		Parent/guardian	15	(68)	20	(80)	16	(67)	51	(72)
Independent		Independent	5	(23)	1	(4)	5	(21)	11	(16)
CLA		CLA	-		1	(4)	-		1	(1)
Institution		Institution	-		1	(4)	-		1	(1)
CHANGES			1	(5)	1	(4)	3	(12)	5	(7)
Independent	--->	Parent/guardian	-		-		2	(8)	2	(3)
CLA	--->	Parent/guardian	1	(5)	-		-		1	(1)
Independent	--->	Institution	-		1	(4)	-		1	(1)
Parent/guardian	--->	Independent	-		-		1	(4)	1	(1)
UNKNOWN			1	(5)	1	(4)	-		2	(3)
		TOTAL	22	(100)	25	(100)	24	(100)	71	(100)

Summary of Changes in Living Arrangements: An examination of the overall changes in living arrangements from 1989-1990 for the total non-SPMR sample reveals no movement toward more independent living. The net result of these changes are shown in the table below. It can clearly be seen that the trend over the past year has been an increase in persons living with parents/guardians (+2) and decreases in independent living arrangements (-2) and CLA placements (-1).

NET CHANGES IN LIVING ARRANGEMENTS, 1989-1990
Total Non-SPMR Sample

Living Arrangement	Mainstream	Center	TMR	PH/SED	Total
Parent/Guardian	+1	+1	-	-	+2
Institution	-	+1	-1	-	0
Independent	-1	-1	-	-	-2
CLA	-	-1	+1	-1	-1
Unknown	-	-	-	+1	+1
	0	0	0	0	0

WORK SITUATIONS

Work-related activities are classified along a continuum which varies by degree of vocational content. Therapeutic Activities Centers (TACs) typically keep youngsters occupied in pre-vocational activities, such as activities of daily living. Individuals with more severe disabilities tend to be enrolled in TACs. Work Activities Centers (WACs) are the next step on the continuum. Participants typically are engaged in activities that involve rudimentary work skills such as assembling and packaging, and work at a pace that is less than 50% of that of an average worker. In this narrative, the term activities center refers to both TACs and WACs. Sheltered workshops move individuals closer to real work. Participants earn wages for working on contracts that may involving assembling, counting, packaging, wrapping and similar skills. They work at a pace that is at least 50% of that of an average worker and earn wages that usually depend on the number of items completed. Vocational training and work-oriented volunteer placements are also included in the continuum. Competitive work for our sample encompasses both regular and supported employment, a new initiative which provides supports to workers and is designed to ease handicapped individuals' entry into the world of work. Work-related activity or work activity includes all the situations described above. An individual described as having no work activity, or idle, was involved in none of these activities at the time of interview.

SPMR: The work activity situation of the 28 SPMR youngsters in the sample are as shown in the table below. The majority (89%) are in activity centers, the remainder have no activity. The three persons with no activity are living in residential institutions. Two of those with no activity were living with their parents at the time of last year's survey; both moved to an institution in the interim, and both remain inactive. All 5 of those still living at home are linked to an activity program. Overall, there has been no change in activity placements within the SPMR group.

PRESENT SITUATION OF SPMRs

	1986 Cohort #	(%)	1987 Cohort #	(%)	Total #	(%)
Activities Center	18	(95)	7	(78)	25	(89)
No Activity	1	(5)	2	(22)	3	(11)
Total	19	(100)	9	(100)	28	(100)

Total non-SPMR sample: The work activity situation of the remainder of the sample is presented in the table below. The major activity categories for the total non-SPMR sample are competitive employment (32%), activity center (26%) and sheltered workshop (12%). Another 26% have no work activity. Looking across the exceptionality categories, it can be seen that the competitive employment category is almost exclusively the province of EMR individuals, both mainstreamed and center-based, and that TMRs dominate the activity center category. Those individuals primarily categorized as having an physical or emotional handicap (PH/SED), in addition to mental retardation, display the widest variety of work situations, represented in all but the training and volunteer categories.

WORK ACTIVITY OF NON-SPMR COMPLETERS, 1986 AND 1987 COHORTS

	EMR									
	Mainstream		Center		TMR		PH/SED		Total	
Present Situation	#	(%)	#	(%)	#	(%)	#	(%)	#	(%)
Regular Job	14	(58)	23	(49)	2	(4)	1	(10)	40	(31)
Supported Work	-		-		-		1	(10)	1	(1)
Training	1	(4)	-		-		-		1	(1)
Sheltered Workshop	-		5	(11)	7	(15)	3	(30)	15	(12)
Activities Center	-		6	(13)	24	(50)	3	(30)	33	(26)
Volunteer	-		-		2	(4)	-		2	(2)
No Activity	8	(33)	11	(23)	13	(27)	1	(10)	33	(26)
Unknown	1	(4)	2	(4)	-		1	(10)	4	(3)
Total	24	(100)	47	(100)	48	(100)	10	(100)	129	(100)

TMRs: The most common work activity situation of TMRs is the activities center, with half the sample (50%) involved in this type of placement. As shown in the table below, over a quarter of the TMRs (27%) are in no work-related activity, 15% are in sheltered workshops, while 2 (4%) are in competitive employment. In addition, two members of the TMR group are in volunteer situations. There is a notable difference between the two cohorts in the number and types of placements. More than half (56%) of the 1986 group are currently placed in activities centers, in contrast to the 43% of the 1987 group who are so placed. The most striking difference between the two groups is that 39% of the 1987 group are without a placement of any kind, while only 16% of the 1986 group have no work situation. Another difference is that, unlike the 1987 cohort, the 1986 cohort has 2 members with regular jobs and 2 with volunteer placements.

PRESENT SITUATION OF TMRs

Present Situation	1986 Cohort #	(%)	1987 Cohort #	(%)	Total #	(%)
Regular Job	2	(8)	-		2	(4)
Sheltered Workshop	3	(12)	4	(17)	7	(15)
Activities Center	14	(56)	10	(43)	24	(50)
Volunteer	2	(8)	-		2	(4)
No Activity	4	(16)	9	(39)	13	(27)
Total	25	(100)	23	(100)	48	(100)

The current configuration of TMR work activities reflects very few changes from last year. As seen in the chart below, 44 (92%) of this year's TMRs are in the same work situation they were in last year. While most are in some kind of work activity, 10 (21%) remain idle, having had no work activity this year or last year. Nearly a third (31%) of the 1987 group fits this description, while 10% of the 1986 group is similarly inactive.

There are 4 TMRs whose work situation changed since last year. Of those 4, 1 went from a no-work situation to placement in an activity center. However, the remaining 3 experienced a reversal, from work placements in 1989 to no work in 1990. One, a resident in an institution, was removed from an activity center because of behavior problems. Another moved with his family to another state, thus losing his placement in a sheltered workshop. Finally, one individual was in an activity center but is now being re-evaluated for future placement.

COMPARISON OF TMR WORK ACTIVITY, 1989 AND 1990

1989 Work Activity		1990 Work Activity	Center 1986 #	Center 1986 (%)	Center 1987 #	Center 1987 (%)	Total #	Total (%)
NO CHANGES			23	(92)	21	(91)	44	(92)
Job		Job	2	(8)	-		2	(4)
Activity Ctr.		Activity Ctr.	13	(52)	10	(43)	22	(46)
Sh. Workshop		Sh. Workshop	3	(12)	4	(17)	7	(15)
Volunteer		Volunteer	2	(8)	-		2	(4)
No work		No work	3	(12)	7	(30)	10	(21)
CHANGES			2	(8)	2	(9)	4	(8)
No work	--->	Activity Ctr.	1	(4)	-		1	(2)
Activity Ctr.	--->	No work	-		1	(4)	1	(2)
Sh. Workshop	--->	No work	1	(4)	1	(4)	2	(4)
		TOTAL	25	(100)	23	(100)	48	(100)

The effect of these 4 changes in placements are shown in the table below. The table shows that the net change in placements for the TMR group as a whole are a decrease in sheltered workshop placements (-2) and an increase in no-work situations (+2).

SUMMARY OF CHANGES IN WORK PLACEMENTS OF TMRs, 1989-1990

Type of Placement	Number of Situations LOST	GAINED	NET RESULT
SHELTERED WORKSHOP	2	0	-2
ACTIVITY CENTER	1	1	0
NO WORK	1	+3	+2
	4	4	

EMRs: The majority of EMRs, 52%, are employed, in regular jobs. As the table below shows, there is also a substantial minority of EMRs, 27%, who are in no work-related activity. The remainder of the EMR group is placed either in sheltered workshops (7%) or activities centers (8%). There are notable differences among the three cohorts, however. Within the 1986 center cohort, fourteen individuals are competitively employed (64%), three are idle (17%) and four are in sheltered workshops and activities centers (14%). The work-related situations of the 1987 center cohort are more varied. Fewer individuals are employed (36%) than in the other cohorts, and more are in sheltered workshops and activities centers (28%). Nearly a third (32%) are idle. Within the mainstream cohort, individuals fall mainly into two categories, competitive employment (58%) and no activity (33%); another individual is enrolled in business training (4%). Both of the 1987 groups, center and mainstream, have higher proportions of unemployed (32% and 33%, respectively) than the 1986 center group (14%).

No one in the EMR groups is engaged in a supported work situation. One member of the 1986 cohort, who had a supported work position last year, was laid off and is now idle. Another individual, a 1987 completer, quit a supported work placement but has since obtained a regular job.

PRESENT SITUATION OF EMRs

Present Situation	1986 Center #	(%)	1987 Center #	(%)	1987 Mainstream #	(%)	Total #	(%)
Regular Job	14	(64)	9	(36)	14	(58)	37	(52)
Supported Work	-		-		-		-	
Training	-		-		1	(4)	1	(1)
Sheltered Workshop	1	(4)	4	(16)	-		5	(7)
Activities Center	3	(14)	3	(12)	-		6	(8)
No Activity	3	(14)	8	(32)	8	(33)	19	(27)
Unknown	1	(4)	1	(4)	1	(4)	3	(4)
Total	22	(100)	25	(100)	24	(100)	71	(100)

Nearly a third (31%) of the EMRs experienced a change from last year's work situation. These changes occurred primarily within the 1987 cohort, both in the center and the mainstream subgroups. Eight cases from each subgroup (32%) of the 1987 cohort are currently placed in a different situation from last year; only 4 (18%) from the 1986 cohort experienced changes. The 20 changes are delineated in the table below.

The table shows that 8 of the changes from last year involved individuals finding new placements in jobs: at the time of last year's survey, 6 were idle, another was in a sheltered workshop, and the work situation of the last was not known. Five of the six previously idle individuals were members of the 1987 cohort, 2 from centers, 3 from the mainstream track. However, these 8 job gains were offset by the experiences of 8 individuals who lost job placements they held last year. This group, shown below the previous 8, consists of 6 persons who were working last year but became idle this year; 1 who resumed a training program after having worked a temporary job; and another who was recently placed in an activity center. Five of the six who went

COMPARISON OF EMR WORK SITUATIONS, 1989 TO 1990

1989 Work Situation		1990 Work Situation	Center 1986 #	Center 1986 (%)	Center 1987 #	Center 1987 (%)	Mainstream 1987 #	Mainstream 1987 (%)	Total #	Total (%)
NO CHANGES			17	(77)	16	(64)	16	(64)	49	(69)
Job		Job	12	(55)	7	(28)	10	(42)	29	(41)
Sh. Workshop		Sh. Workshop	1	(5)	4	(16)	-		5	(7)
Activity Ctr.		Activity Ctr.	2	(9)	1	(4)	-		3	(4)
No work		No work	2	(9)	4	(16)	6	(25)	12	(17)
CHANGES			4	(18)	8	(32)	8	(32)	22	(31)
No work	--->	Job	1	(5)	2	(8)	3	(13)	6	(8)
Sh. Workshop	--->	Job	-		-		1	(4)	1	(1)
Unknown	--->	Job	1	(5)	-		-		1	(1)
Job	--->	No work	1	(5)	3	(12)	2	(8)	6	(8)
Job	--->	Training	-		-		1	(4)	1	(1)
Job	--->	Activity Ctr.	1	(5)	-		-		1	(1)
Sh. Workshop	--->	Activity Ctr.	-		1	(4)	-		1	(1)
No work	--->	Activity Ctr.	-		1	(4)	-		1	(1)
Unknown	--->	No work	-		1	(4)	-		1	(1)
Job	--->	Unknown	-		-		1	(4)	1	(1)
UNKNOWN			1	(5)	1	(4)	-		2	(3)
TOTAL			22	(100)	25	(100)	24	(100)	71	(100)

from jobs to idleness were members of the 1987 cohort: 3 were center completers, 2 were mainstreamers.

The four remaining changes were also experienced by members of the 1987 cohort. Two center completers were placed in activity centers: 1 was in a sheltered workshop last year, another was idle. Another center completer whose work situation was unknown last year is reported to be idle this year. The final case involves a mainstreamed individual who was working at a job last year, but whose work situation this year is unknown.

The effect of these 20 changes in placements are shown in the table below. It can clearly be seen that the net change in placements for the EMR group includes more activity center placements (+3) and fewer job (-1) and sheltered workshop (-2) placements.

SUMMARY OF CHANGES IN WORK PLACEMENTS OF EMRs, 1989-1990

Type of Placement	Number of Placements LOST	GAINED	NET RESULT
JOB	4	3	-1
TRAINING	0	1	+1
SHELTERED WORKSHOP	2	0	-2
ACTIVITY CENTER	0	3	+3
NO WORK	2	2	0
UNKNOWN	2	1	-1
	10	10	0

Summary of Changes in Work Situations: An examination of the net changes in work situations for the entire non-SPMR sample over the past year reveals no movement toward more challenging work placements for the study subjects. As noted earlier, and as seen in the table below, the work situation changes for the EMR group have resulted in more activities center placements (+3) and fewer job (-1) and sheltered workshop placements (-2). The net change in situations for the TMR group, moreover, include the loss of 2 sheltered workshop placements and an increase of 2 no-work conditions. Only within the PH/SED group is some improvement seen: the addition of one jobholder in the PH/SED group.

NET CHANGE IN WORK SITUATIONS, 1989-1990, BY EXCEPTIONALITY
Total Non-SPMR Sample

Work Situation	EMR		TMR	PH/SED	Total
	Mainstream	Center			
Job	-	-1	-	+1	0
Training	+1	-	-	-	+1
Sheltered Workshop	-1	-1	-2	-	-4
Activities Center	-	+3	-	-	+3
Volunteer	-	-	-	-	0
No work	-1	+1	+2	-2	0
Unknown	+1	-2	-	+1	0
	0	0	0	0	0

COMPETITIVE EMPLOYMENT

Present employment:

41 (32%) of the 129 young people in the non-SPMR sample are employed in competitive or supported work. 90% of these competitively employed individuals are EMRs, both mainstream (34%) and center-based (56%). The remaining 9% of the workers (4 individuals) are also from the centers. Two are classified as TMRs, one as PH, and one as SED/LAP.

EXCEPTIONALITY OF WORKERS IN 1990

Exceptionality	#	(%)
Mainstream	14	(34)
Center:		
EMR	23	(56)
PH	1	(2)
SED/LAP	1	(2)
TMR	2	(4)
Total	41	(100)

Types of Jobs: As the table below indicates, the food services sector continues to be the single most important source of employment for the study's workers. Of the 41 subjects with jobs, 14 (34%) are working in restaurants, fast food outlets, or cafeterias. Another 8 (20%) work in health care institutions, including nursing home and hospitals. Thus, more than half (54%) of the workers are employed in just two sectors, health care and food services. The remainder work in a variety of settings. There are, altogether, 9 individuals who work in janitorial positions: 4 work in health care settings, 5 work in other environments. Thus, 22% of the positions in competitive employment are janitorial in nature.

Three respondents were not able to give detailed descriptions of the type or location of the work; these cases are listed in the table as "Unknown".

TYPES OF JOBS HELD BY THOSE WITH COMPETITIVE EMPLOYMENT

	Mainstream		Center		Total	
TYPES OF JOBS	#	(%)	#	(%)	#	(%)
Restaurant/cafeteria:	6	(43)	8	(30)	14	(34)
Dishwasher	1	(7)	4	(15)	5	(12)
Busboy	1	(7)	-		1	(2)
Busboy/dishwasher	1	(7)	-		1	(2)
Cook	1	(7)	1	(4)	2	(5)
Miscellaneous	2	(14)	3	(11)	5	(12)
Nursing Home/Hospital:	2	(14)	6	(22)	8	(20)
Nurse Aide	1	(7)	2	(7)	3	(7)
Janitor	1	(7)	3	(11)	4	(10)
Monitor	-		1	(4)	1	(2)
Other:	6	(43)	13	(48)	19	(46)
Janitor	1	(7)	4	(15)	5	(12)
Warehouse caller	-		1	(4)	1	(2)
Navy	-		1	(4)	1	(2)
Messenger	1	(7)	-		1	(2)
Meatcutter	-		1	(4)	1	(2)
Laborer	-		2	(7)	2	(5)
Stock clerk	2	(14)	-		2	(5)
Clerical	1	(7)	-		1	(2)
Mechanic	-		1	(4)	1	(2)
Driver	1	(7)	-		1	(2)
Unknown	-		3	(11)	3	(7)
Total	14	(100)	27	(100)	41	(100)

TRAINING AND PLACEMENT

In last year's study it was noted that several persons had completed formal training programs aimed toward eventual placement in a specific occupation or work setting. Since then, many of these youngsters have found employment related to the subject area of the training. This section reviews the types of training undertaken by the youngsters and provides an update on the outcome of that training.

Post-school training: Fifteen persons (12% of the non-SPMR sample) have completed post-school training programs since leaving school. 11 of these (73%) were center completers; the remaining 4 (27%) were mainstreamed. As the table below shows, the most common subjects for those who completed training programs were: Nurse Aide (33%), and Janitor/Custodian (33%). Other fields studied were food service, clerical, commercial art, and cooking.

TYPES OF TRAINING PROGRAMS COMPLETED BY STUDY SUBJECTS

Study Subject	Mainstream #	Mainstream (%)	Center #	Center (%)	Total #	Total (%)
Nurse Aide	1	(25)	4	(36)	5	(33)
Janitorial	-		5	(45)	5	(33)
Food Service	1	(25)	1	(9)	2	(13)
Clerical	1	(25)	-		1	(7)
Commercial Art	-		1	(9)	1	(7)
Cooking	1	(25)	-		1	(7)
Total	4	(100)	11	(100)	15	(100)

Jobs in field of training: 11 of the 15 (82%) who completed training programs are currently working. As the table below shows, 6 of the 11 (54%) obtained jobs in the fields in which they were trained. Of the 5 who are also employed, 2 found employment in related work settings, but are doing different work than that for which they trained (i.e., two nurse aides working as housekeepers in nursing homes); three are working in jobs unrelated to their training. These findings are delineated in the chart below.

JOB STATUS AND TRAINING SUBJECTS OF TRAINING PROGRAM COMPLETERS

Training Subject	Idle	With Job: Not in Field	With Job: In Field	Total Completers
Nurse Aide		2	3	5
Janitorial	1	2	2	5
Food Service	2			2
Clerical	1			1
Cooking			1	1
Commercial Art		1		1
	4	5	6	15

Only one person is currently enrolled in a training program, a mainstreamer taking business courses.

Center Completers: The Importance of Training

Training seems to be an important steppingstone to employment for many center completers. As the table below shows, 83% of those center EMRs and SED/LAPs who received post-school vocational training have jobs, compared with 38% of those who did not have such training. Those who received post-school training were significantly more likely to be employed than those who had not received such training (p=.013).

EMPLOYMENT STATUS BY POST-SCHOOL TRAINING
Center Completers, EMR and SED/LAP

	No Post-school Training		With Post-school Training		Total	
Job Status	#	(%)	#	(%)	#	(%)
Without a job	28	(62)	2	(17)	30	(53)
With a job	17	(38)	10	(83)	27	(47)
Total	45	(100)	12	(100)	57	(100)

$X^2 = 6.16$, p.=.013

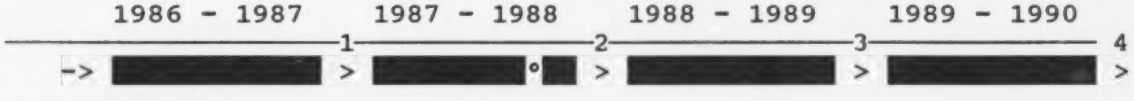
These results must be interpreted with caution. It is not possible to conclude that training per se makes all the difference. It is likely that more able youngsters received training, or successfully completed training programs, than those who are less able.

WORK HISTORIES: A LONGITUDINAL VIEW

This study marks the fourth year of research tracing the process of transition from school to work experienced by a relatively constant group of subjects. It thus provides a unique opportunity to scan the "careers" of the study subjects and gain some insight into the transition process as it evolves over a period of several years. What follows is a detailed look at the work histories of those in the TMR and EMR groups within the 1986 and 1987 cohorts. It is a compilation of information about the total work and training experiences of each person, as reported by parents, guardians, and staff members of residential facilities, for each year of the study. Thus, four years of work activity data are presented for the 1986 cohort, and 3 years of data are presented for the 1987 cohort. Work histories for each member of these groups are graphically illustrated in this section. Cases are grouped on the basis of similarities in the numbers, types and duration of work and training placements. As a guide to the reader, an example of one work history is described below.

Example of Work History: In the work history charts, the symbol -> designates each individual within the current study sample, at the point where he or she completed school. The symbol > marks each interview point of the four-year study. The passage of time is indicated from left to right. In the example below, the individual completed school in June of 1986, which is designated as the starting point (->). This individual worked in a regular job (■) after completing school, and continued on that job until the first survey point in the summer of 1987 (>). In 1988, that person's work was interrupted (°), but soon afterward he obtained a new job. The person continued on that job through the second, third and fourth survey points. Thus, at each survey point, that individual was recorded as working in competitive employment.

EXAMPLE OF WORK HISTORY

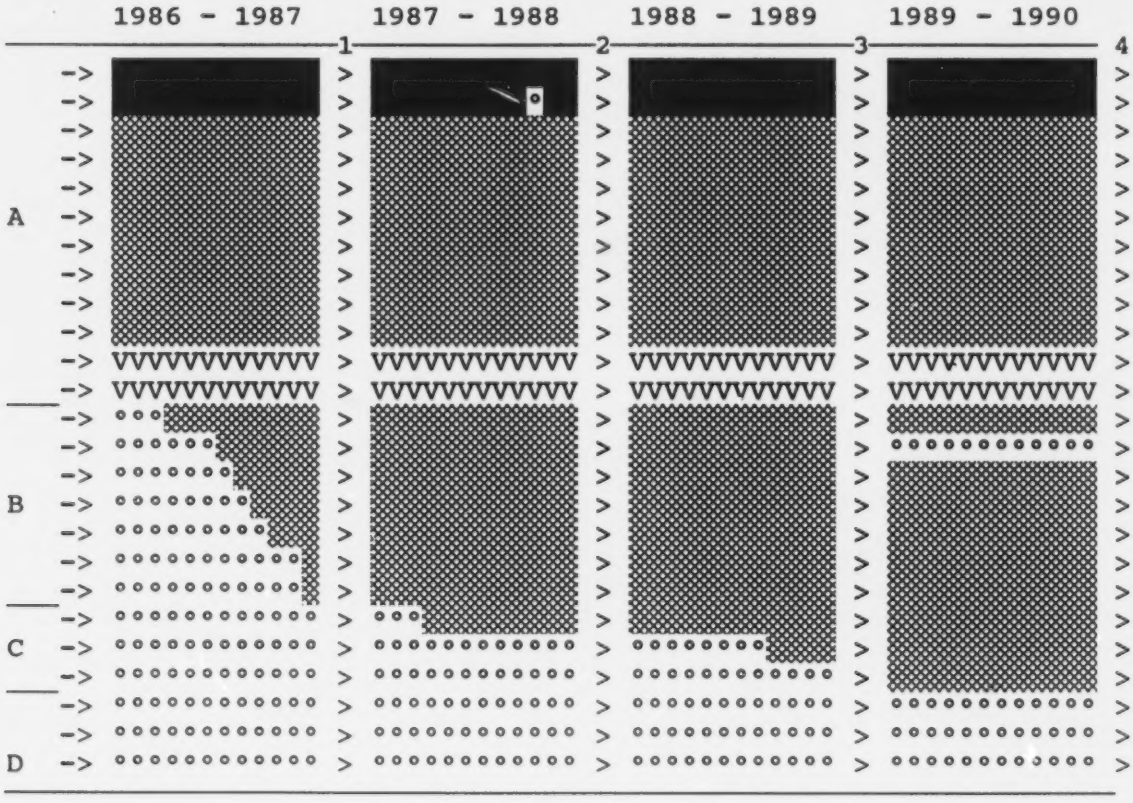


■ Competitive Employment
° No work activity
-> Starting Point
> Interview Point

TMRs: An examination of the individual work histories of persons in the 1986 TMR group reveals that the transition process has been characterized by stability. Sub-group A consists of 12

individuals who have been in some type of work situation (job, sheltered workshop, or activities center) virtually without interruption since completing school. The group comprises 48% of the 1986 TMR sample. Sub-group B includes another 7 persons (28%) who were placed in activities centers or sheltered workshops within the first year after completion; all but one retained this placement through each interview point in the four year study. Only 3 persons (12%), designated as subgroup C, were placed during subsequent years. Lastly, 3 persons (12%) have gone four years without a placement of any kind. Overall, then, there have been few changes in work situation, not only from year to year, but also throughout the four-year period.

FOUR-YEAR WORK ACTIVITY HISTORIES
TMRs - 1986 COHORT



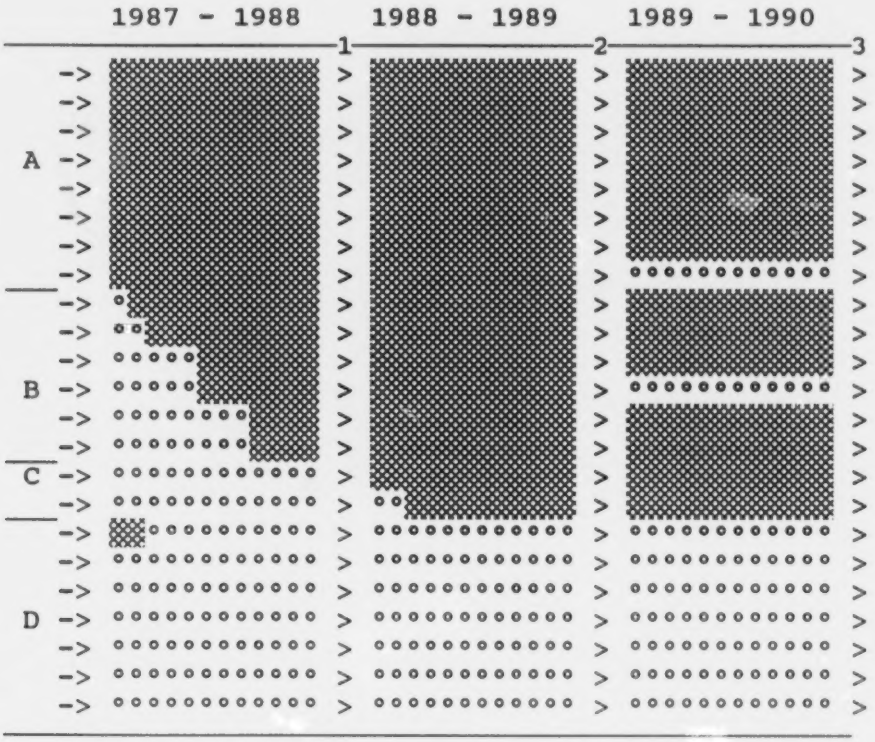
N = 25

Legend:

- Competitive Employment
- Activities Center or Sheltered Workshop
- VVVV Volunteer Placement
- °°°° No Work Activity

The work histories of the 1987 cohort follow nearly the same pattern, as seen below. Subgroup A, comprising 32% of the sample, obtained placements immediately after completing school. Except for one individual who became idle this past year, all remain in that initial placement. Subgroup B, which makes up 26% of the sample, consists of 6 individuals who found their current placement within one year of leaving school. Again, all but one have retained that placement. Two persons, designated subgroup C, were placed during the second study year. Once placed, members of the 1987 TMR group tended to remain within their initial work situations.

THREE-YEAR WORK ACTIVITY HISTORIES
TMRs - 1987 COHORT



N = 23

Legend:

- Competitive Employment
- Activities Center or Sheltered Workshop
- VVVV Volunteer Placement
- °°°° No Work Activity

What distinguishes the 1987 TMR group from the 1986 TMR group is the relatively high proportion of the sample with no work placement at any of the three interview points. Seven

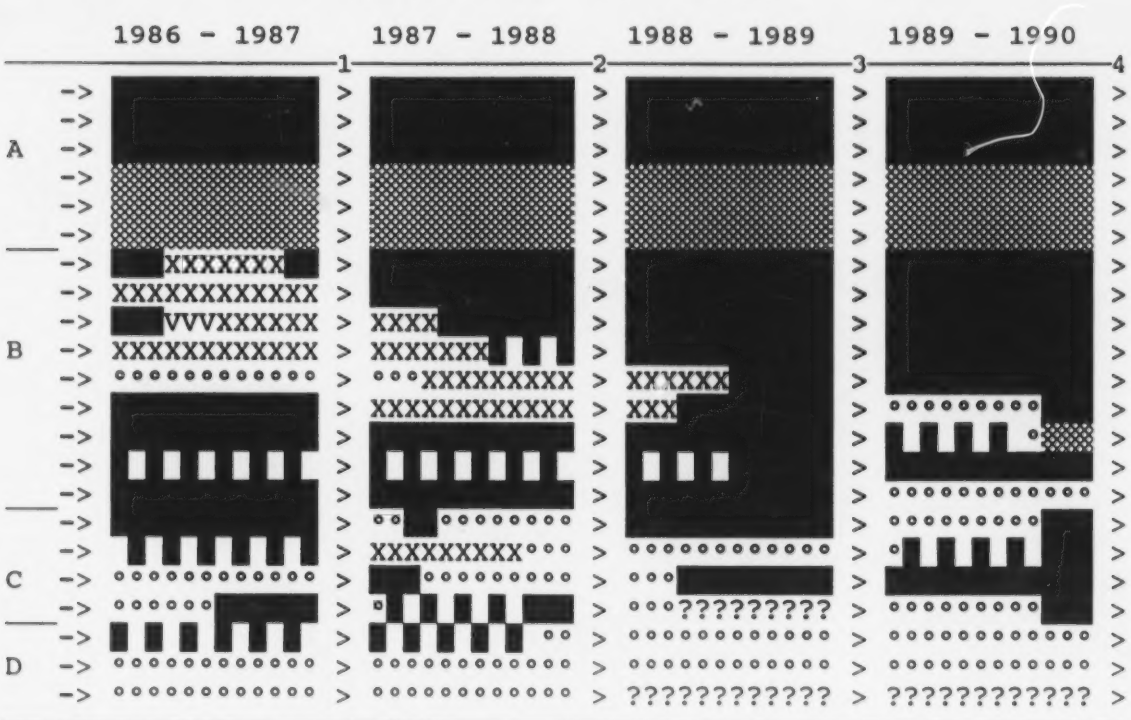
persons (30%), shown in subgroup D, have been idle all three years; only one has had any post-school work experience, a short-lived placement in an activities center.

Thus, those in the TMR groups tend to be characterized by consistency and longevity of both work placements and no-work situations.

EMRs: By contrast, the work histories of the EMR group collectively reveal a great deal of variation in types, numbers, and duration of work placements. This description holds true for both the 1986 and 1987 cohorts. The work history charts for the EMR groups clearly and visually show the kinds of variations in patterns of work situations that was not seen in those of the TMR groups.

Work histories for the 24 members of the 1986 EMR group are graphically shown on the next page. Subgroup A, representing 25% of the cohort, consists of the 6 individuals who have remained in their first work placement since leaving school four years ago. Two of these continued the co-op jobs they held while in school. Nine persons are in subgroup B, which makes up 38% of the cohort. Although they have had some type of work activity during most of the four-year period, they have all faced a second transition during that time. Six have completed a post-school training program ("XXX") followed by a job placement. The remaining 3 have held more than one job or work placement. All but one of the members of subgroup B are currently working; one moved from a job in 1989 to an activities center in 1990. For the 4 persons in subgroup C (21%), the transition process has been even more irregular. Although all are now working, their work histories have featured long periods of idleness or sporadic employment, punctuated by several transitions. The work histories of the 3 persons in subgroup D (12%) are characterized by few work experiences and periods of idleness lasting 2 years or more.

FOUR-YEAR WORK/TRAINING HISTORIES
CENTER EMRs - 1986 COHORT



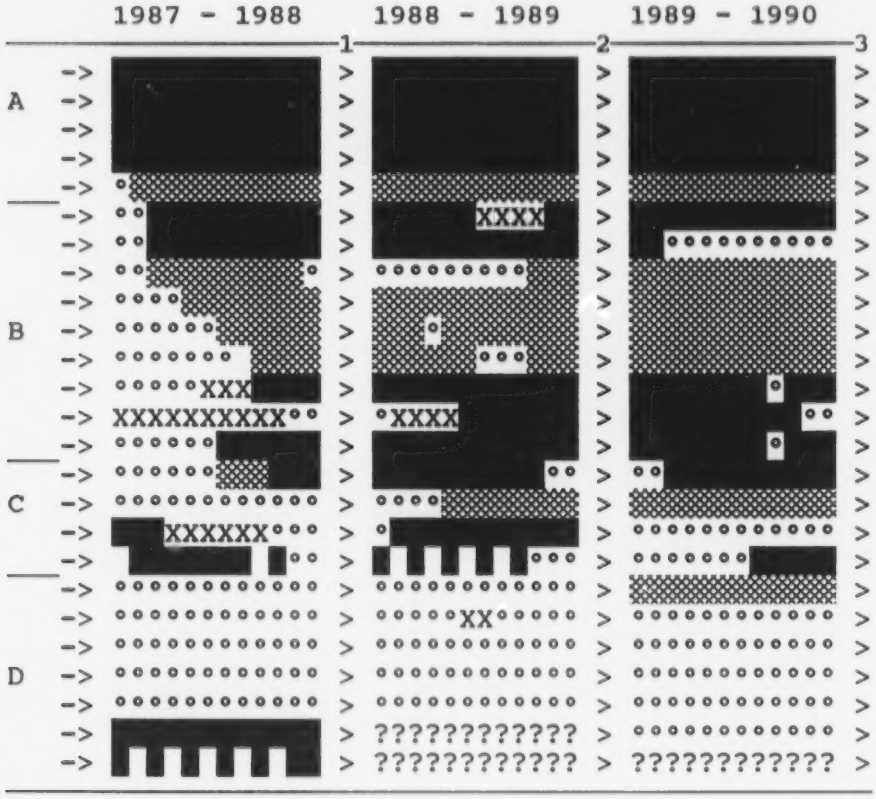
N = 22

LEGEND:

▬▬	Steady Employment	VVVV	Volunteer Placement
▮▮	Interrupted Employment	°°°°	No Work Activity
XXXX	Formal Training Program	????	Activity Unknown
▒▒	Activities Center or Sheltered Workshop		

The career histories of the 1987 EMR cohort resemble those of the 1986 cohort. As illustrated below, members of the 1987 group tend not to remain in one placement after completing school. The 5 who have, represented by subgroup A, comprise 20% of the sample. Subgroup B, with 36% of the sample, began placements during their first year after completion but faced at least one additional transition during the next two years (e.g., completing a training program and finding a job afterwards). Subgroup C (17%) is similar to B, but is comprised of persons

THREE-YEAR WORK/TRAINING HISTORIES
CENTER EMRs - 1987 COHORT



N = 22

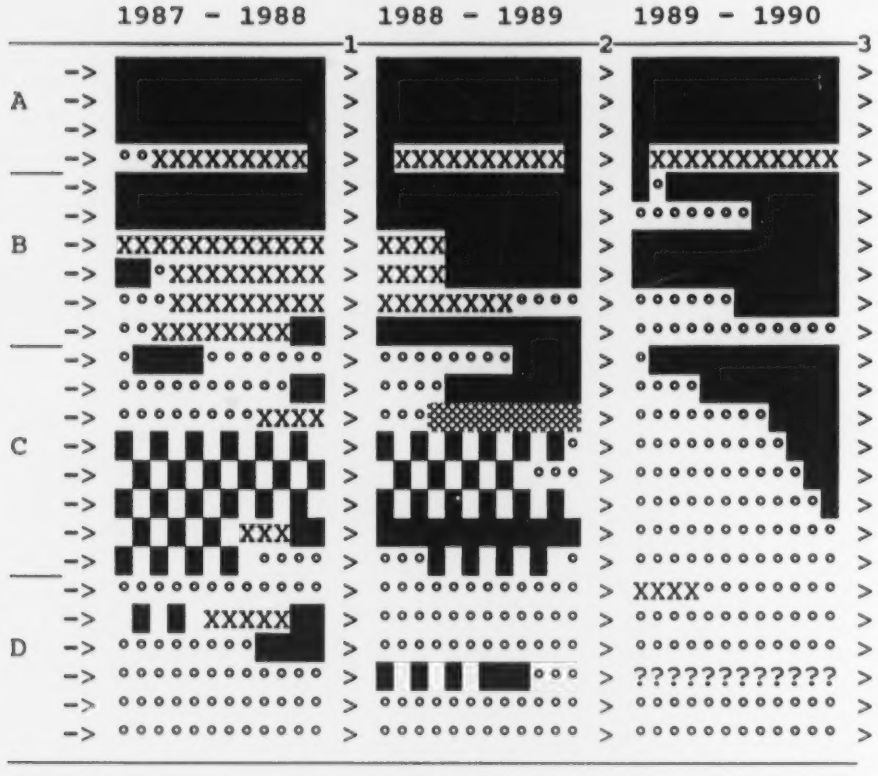
LEGEND:

■	Steady Employment	VVVV	Volunteer Placement
▮▮	Interrupted Employment	°°°°	No Work Activity
XXXX	Formal Training Program	????	Activity Unknown
▒	Activities Center or Sheltered Workshop		

with periods of idleness or sporadic work, up to a year in length. The somewhat large subgroup D, 27% of the sample, is made up of individuals with little known work experience, and very long periods of idleness.

The graphic illustration of career histories for the mainstream group shows even more dramatic variations in work placements. Only 4 persons out of 24 (16%) remain in their initial post-school placements of three years ago. These 4 are depicted in subgroup A below. Subgroup B, which includes those

THREE-YEAR WORK/TRAINING HISTORIES
MAINSTREAM EMRs - 1987 COHORT



N = 24

LEGEND:

▬	Steady Employment	VVVV	Volunteer Placement
▮▮	Interrupted Employment	°°°°	No Work Activity
XXXX	Formal Training Program	????	Activity Unknown
▒▒	Activities Center or Sheltered Workshop		

who have made transitions from post-school training to work or from one job to another, comprises 25% of the sample. Eight persons (33%) of the 24 fall into subgroup C, which represents careers marked by sporadic employment, discontinued training programs, and periods of idleness up to a year in length. Within group C, six persons are currently placed; these have all taken new jobs within the past year. Lastly, 6 persons (25%) are in subgroup D. Members of this group have histories of limited or sporadic work, very long periods of idleness, and no known work placement at present.

Summary of Work Histories: The foregoing explication of work histories reveals contrasting patterns of placement and continuity for the TMR and EMR groups. For the TMR group, the general pattern has involved the following elements: 1) early placement for most, usually immediately after completion of school or within one year afterward; 2) few additional placements in subsequent years; 3) no movement into more challenging work situations, such as competitive work; 4) long periods of idleness for those who are not placed immediately. Thus, 63% of the persons in the TMR sample remain in the placements they attained within one year of completion, while 21% have had no placement since leaving school.

In contrast, the work histories of the Center EMRs tend to show patterns characterized by multiple transitions. Only 11 (23%) of the 47 individuals in the center EMR sample have retained their initial post-school placement. The majority (55%) have obtained at least two, in some cases several, different placements since completion (e.g., from training to work, or from one job to another to another). The remaining 21% have had either sporadic jobs, or long periods of idleness.

The careers of many of those in the mainstreamed group are marked by even more irregularity of placements. Initial post-school placements have remained permanent for only 16% of the members of this group. Fully half (50%) have had at least three different work situations over the three-year study period. Six persons (25%) have been idle for most or all of the three-year period.

PHYSICAL AND EMOTIONAL DISABILITIES

This part of the report examines the association between the physical or emotional disabilities of the study subjects and such outcomes as living arrangements or work placements. Up to this point, the focus has been upon individuals whose primary exceptionality has been classified as EMR or TMR. Within each of these groups are certain individuals who have some type of disability in addition to mental retardation. These persons may, as a secondary exceptionality, be classified as physically handicapped (PH) if they have conditions such as blindness or vision problems, deafness or hearing problems, seizures, or cerebral palsy. Others may have a secondary exceptionality that is categorized as socially and emotionally disturbed/learning and adjustment problems (SED/LAP). For each center completer in the study, primary and secondary exceptionalities were assigned as officially recorded in the school records.

As the table below shows, 8 of the individuals classified as EMRs also have secondary exceptionalities (2 PH, 6 SED/LAP). Nine persons classified as TMRs also have secondary exceptionalities (7 PH, 2 SED/LAP). Within each primary exceptionality group there are 39 persons who do not have a secondary exceptionality.

SECONDARY EXCEPTIONALITIES OF EMRs AND TMRs

Primary Exceptionality	Secondary Exceptionality			No Secondary Exceptionality	Total
	PH	SED/LAP	Total		
EMR	2	6	8	39	47
TMR	7	2	9	39	48
TOTAL	9	8	17	78	95

In addition, there are individuals within the study sample whose primary exceptionality is classified as PH or SED/LAP. As shown below, there are 3 persons whose primary exceptionality is PH and whose secondary exceptionality is designated as EMR. Five persons have a primary exceptionality of SED/LAP: 3 have a secondary exceptionality of EMR, and 2 have a secondary exceptionality of TMR.

SECONDARY EXCEPTIONALITIES OF PHs AND SED/LAPs

Secondary Exceptionality	Primary Exceptionality PH	SED/LAP	Total
EMR	3	3	6
TMR	-	2	2
TOTAL	3	5	8

Thus, there are 50 persons in the study sample whose primary or secondary exceptionality is TMR, and 53 whose primary or secondary exceptionality is EMR. We will discuss the work and living arrangements of each of these groups, beginning with the TMRs.

TMRs: Of the 50 persons in the study sample with MR involvements at the TMR level, 11 have an additional disability, and 39 do not. As shown below, 38 of the 50 TMRs (76%) are living with parents or guardians, while the remaining 24% live in CLAs or institutions. The proportion of those without disabilities who are living at home (82%) is greater than that of the individuals with additional disabilities (55%); however this difference is not statistically significant.

LIVING ARRANGEMENT OF TMRs BY PRESENCE OF ADDITIONAL DISABILITY

Living Arrangement	Presence of Additional Disability NO #	(%)	YES #	(%)	Total #	(%)
Parent/Guardian	32	(82)	6	(55)	38	(76)
CLA, Group Home	4	(10)	2	(18)	6	(12)
Institution	3	(8)	3	(27)	6	(12)
Total	39	(100)	11	(100)	50	(100)

The presence of an additional disability does not appear to have affected the work placements of the TMRs. As seen in the table below, 24 of the 50 TMRs (47%) are in activities centers, and 16% are in sheltered workshops. The proportions in both subgroups are similar for these categories of placements.

WORK SITUATION OF TMRs BY PRESENCE OF ADDITIONAL DISABILITY

	Presence of Additional Disability					
	NO		YES		Total	
Work Situation	#	(%)	#	(%)	#	(%)
Activities Center	19	(49)	5	(42)	24	(47)
Sheltered Workshop	6	(15)	2	(17)	8	(16)
Competitive Employment	2	(5)	-		2	(4)
Volunteer	2	(5)	-		2	(4)
No work activity	10	(26)	4	(33)	14	(27)
Total	39	(100)	11	(100)	50	(100)

EMRs: Of the 53 persons whose primary or secondary exceptionality is categorized as EMR, 14 have additional disabilities, 39 do not. Living arrangements for persons in the EMR category do not differ significantly between the two subgroups. As shown in the table below, 74% of both groups are living with parents or guardians. However, 6 (15%) of those without additional disabilities are living independently, compared to 1 (7%) of those without additional disabilities. While this difference is notable, the numbers are too small to be statistically significant.

LIVING ARRANGEMENTS OF EMRs BY PRESENCE OF ADDITIONAL DISABILITY

	Presence of Additional Disability					
	NO		YES		Total	
Living Arrangement	#	(%)	#	(%)	#	(%)
Parent/Guardian	29	(74)	10	(74)	39	(74)
Independent	6	(15)	1	(7)	7	(13)
CLA, Group Home	1	(3)	-		1	(2)
Institution	1	(3)	2	(14)	3	(6)
Not known	2	(5)	1	(7)	3	(6)
Total	39	(100)	14	(100)	53	(100)

Work arrangements within the EMR group are quite different between the two subgroups. For example, 56% of those without an additional disability are competitively employed, in contrast to 21% of those with an additional disability. At the same time, the most common placement of the additionally disabled, the activities center (36%), is the work situation of only 8% of those without disabilities.

WORK SITUATIONS OF EMRs BY PRESENCE OF ADDITIONAL DISABILITY

	Presence of Additional Disability					
	NO		YES		Total	
Work Situation	#	(%)	#	(%)	#	(%)
Competitive Employment	22	(56)	3	(21)	25	(47)
Sheltered Workshop	4	(10)	2	(14)	6	(11)
Activities Center	3	(8)	5	(36)	8	(15)
No work activity	8	(21)	3	(21)	11	(21)
Not known	2	(5)	1	(7)	3	(6)
Total	39	(100)	14	(100)	53	(100)

The difference in the competitive employment of the two subgroups is significant. As the table below demonstrates, the presence of an additional disability may be an important factor in the type of placement available to EMRs. Only 3 of those with physical or emotional disabilities have been able to obtain placements in competitive employment.

EMPLOYMENT STATUS OF EMRs, BY PRESENCE OF ADDITIONAL DISABILITIES

	Presence of Additional Disability					
	NO		YES		Total*	
Work Situation	#	(%)	#	(%)	#	(%)
Competitively employed	22	(59)	3	(23)	25	(50)
Not competitively employed	15	(41)	10	(77)	25	(50)
	37	(100)	13	(100)	50	(100)

$X^2 = 5.0935$
$p = .024$

*Excludes three individuals whose work situation is not known.

FOLLOW-UP OF MENTALLY RETARDED SCHOOL COMPLETERS: 1990 COHORT

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FOLLOW-UP OF MENTALLY RETARDED YOUTH: 1990 SCHOOL COMPLETERS

EXECUTIVE SUMMARY

The second aspect of the HWPA/CRA project underwritten by the Edith L. Trees Charitable Trust research this year involves following an additional cohort of youngsters, those completing school in the 1989-1990 school year. Parents and guardians of youngsters who completed their educations in the Allegheny Intermediate Unit's (AIU's) special education programs were contacted. As in previous years, respondents were queried as to youngster's living arrangement and work situations, including jobs held during the time the youngster was attending school, and post-school placements planned or in progress. New questions were added asking parents about their involvement in transition planning for the youngster. Findings for this cohort are of interest in themselves, and also can be compared with those of earlier cohorts: the 1985-1986 and 1986-1987 school completers.

This report presents findings as to living arrangments, work situations arranged and in-progress, both in-school and post-school job placements, and training. Conclusions regarding transition planning, and comparisons between the 1990 cohort and cohorts examined in our previous studies, are also included.

FINDINGS

Living Arrangements: The vast majority (91%) of the total non-SPMR sample lives with parents or guardians, including all mainstreamed EMRs. Three others (3%), all center EMRs, live independently. An additional 5 (5%), including 3 TMRs, are in group situations or CLAs.

Work Situations: Post-school work placements have been arranged for 63 (64%) of the non-SPMR completers. The proportion of completers without a post-school placement differs by exceptionality. For center completers, the proportions range from 12% for those in the SED/LAP group to 40% for those in the PH group. 50% of mainstreamed EMRs are without a placement.

Post-school Job Placements: Of those who have job placements, 42% have summer jobs; 58% have permanent placements. One person is in supported work on a permanent basis. Schools were an important source of job information for 82% of summer jobs and 50% of permanent jobs. 63% of jobs involve less than 35 hours per week. Summer jobs average 33.14 hours per week, permanent jobs average 25.25 hours per week.

Post-school Training: 19 persons (20%) have training placements planned or in progress. 47% of those in training programs are in the center EMR group, 21% are mainstreamed. Food Service programs comprise the largest segment of trainees, 26%; Child Care, 16%; and Data Processing, 16%.

Parent Involvement in Transition Planning: 80% of parents/guardians within the TMR and PH groups indicated some involvement in planning. The lowest participation rates were found among the mainstream (50%), center EMR (52%) and SED/LAP (50%) groups. Participation rates were significantly lower for respondents from families with annual incomes under $25,000. Rates of post-school placement are significantly higher for individuals whose parents or guardians reported that they were involved in transition planning. Post-school placement rates for significantly lower for individuals from families with incomes under $25,000.

CONCLUSIONS

Obstacles to Full Parental Involvement in Transition Planning: Lower rates of participation in transition planning are found among lower-income families, and families of mainstream EMRs, center-based EMRs and SED/LAPs.

Comparison of Three Cohorts: While the 1990 sample differs somewhat in composition from the previous ones, the findings suggest that, at this early stage, the groups do not substantially differ in terms of outcomes. The 1990 cohort had far fewer individuals in the SPMR group than the 1986 and 1987 cohorts, and significantly more individuals in the PH and SED/LAP groups. Differences in the proportions of individuals in various types of living, working and training situations, however, are minor in most instances. Although 50% of the 1990 mainstream group is without work, compared to 27% of the 1987 group, the difference is not great enough to be significant.

STUDY SECTION:

SUMMARY OF FINDINGS

SUMMARY OF FINDINGS

The second aspect of the HWPA/CRA project underwritten by the Edith L. Trees Charitable Trust research this year involves following an additional cohort of youngsters, those completing school in the 1989-1990 school year. Parents and guardians of youngsters who completed their educations in the Allegheny Intermediate Unit's (AIU's) special education programs were contacted. Youngsters with an MR involvement of any degree who had attended one of the six special education centers were followed. Also included in the 1990 sample were youngsters who had been in mainstreamed MR classes under AIU auspices in regular district high schools. These individuals were all classified educable mentally retarded (EMR). The majority of the respondents were interviewed in the summer immediately following their youngster's graduation from school.

As in previous years, respondents were queried as to youngster's living arrangement and work situations, including jobs held during the time the youngster was attending school, and post-school placements planned or in progress. They were also asked to supply information about household size, family income and ages of parents. New questions were added asking parents about their involvement in transition planning for the youngster. Findings for this cohort are of interest in themselves, and also can be compared with those of earlier cohorts: the 1985-1986 and 1986-1987 school completers.

This section will summarize the study findings. It will include aspects of living arrangments, work situations arranged and in-progress, both in-school and post-school job placements, and training. Conclusions regarding transition planning and comparisons between the 1990 cohort and cohorts examined in our previous studies close out this section.

LIVING ARRANGEMENTS

SPMR: 43% (3 of 7) SPMRs live in institutions, 43% live with parents or guardians, and 14% live in group living arrangements or CLAs.

Total non-SPMR sample: The vast majority (91%) of the total non-SPMR sample lives with parents or guardians, including all mainstreamed EMRs. Three others (3%), all center EMRs, live independently. An additional 5 (5%), including 3 TMRs, are in group situations or CLAs.

WORK SITUATIONS

For this report, post-school work situations refer both to

those that are: 1) in progress at the time of the interview, and 2) imminent, i.e., arrangements are definite and placements are scheduled to begin within a few months. They include: 1) summer jobs, and 2) combinations of work and training, in which the duration of the work is for the summer and the training portion is to begin in the fall. Work situation in this context includes involvement in sheltered workshops, activities centers, training and competitive employment.

The SPMR Group: Five (71%) of the 7 individuals in the SPMR group are attending activities programs, including the 4 in group residences or institutions, as well as 1 who lives with parents. Two are not attending activities programs; both live at home.

Total Non-SPMR Group:

* Post-school work placements have been arranged for 63 (64%) of the non-SPMR completers.

* 38 persons (40% of the non-SPMR sample) have placements involving competitive employment, which includes regular jobs, supported work, and summer jobs.

* 19 persons (20%) have training placements planned or in progress. 12 of these plan to enter training programs after working in summer jobs.

* 9 persons in the sample (10%) are in work situations that are only for the summer and have no planned placements beyond August of 1990.

* 34% of all the non-SPMR completers have no arrangements for post-school work placements.

* The proportion of completers without a post-school placement differs by exceptionality. For center completers, the proportions range from 12% for those in the SED/LAP group to 40% for those in the PH group. 50% of mainstreamed EMRs are without a placement.

JOB PLACEMENTS

Job placements include: 1) in-school placements, and 2) post-school jobs, arranged or in progress at the time of the interview.

* 1/3 of the non-SPMRs have both in-school job experience and post-school jobs.

* 18% had a job placement while in school, but no post-school job planned.

* 7% did not have a job placement while in school, but

have a post-school job placement arranged.

* The remaining 42% have neither in-school job experience nor post-school job placements.

* Sixteen members (35%) of the center EMR group and 8 members (50%) of the mainstream EMR group have neither type of job.

In-School Job Placements

Three types of job placements are considered in this discussion: 1) regular jobs, 2) co-op jobs, placements arranged for students through the school system, and 3) supported work.

* 48 (51%) of the 95 members of the non-SPMR group held one of these types of jobs while attending school. Within the mainstream group, 71% of workers held regular jobs, 29% were placed in co-op jobs. One person was engaged in supported work arranged through the school.

* Co-op and supported workers averaged 16.25 hours/week, while those in regular jobs averaged 15.92 hours/week.

* 42% of the jobs held while attending school consisted of placements in the restaurant/fast food sector. 69% of those with regular jobs were working in this sector; 28% of those with co-op/supported jobs were similarly placed.

* 34% of the co-op jobs consisted of placements at one of the six special education centers.

* Supermarkets and grocery stores provided approximately one-fifth of all co-op placements (22%) and regular jobs (19%).

* Average wage for regular jobs was $3.91, compared to an average of $2.29 for the co-op and supported positions. If jobs in the $1.00 - $1.20 category are excluded, average wage rates are: $3.78 for co-op and supported work, $3.91 for regular jobs.

* Schools provided information or referral for 85% of in-school job placements: 56% of the regular jobs and all of the co-op and supported work placements. 8% of the students found jobs through family members, 6% found jobs on their own.

* In-school jobs are retained after school is completed by 50% of those with regular jobs, 29% of those in co-op placements.

* 62% of those who worked while in school have a new post-school placement arranged.

Post-school Job Placements

Post-school job placements include regular jobs, summer jobs and supported work. Jobholders are found mainly in the EMR group, both center (63%) and mainstream (16%).

* Of those who have job placements, 42% have summer jobs; 58% have permanent placements. One person is in supported work on a permanent basis.

* 44% of the summer jobs are at area schools. The permanent job placements involve a wide range of jobs and work sites; 36% are at restaurants and fast food outlets.

* 63% of jobs involve less than 35 hours per week. Summer jobs average 33.14 hours per week, permanent jobs average 25.25 hours per week.

* Average wage for jobholders is $3.96/hour. Summer workers $3.89, other workers $4.01.

* Schools were an important source of job information for 82% of summer jobs and 50% of permanent jobs.

* 85% of job placements involve daytime work.

POST-SCHOOL TRAINING

* 20% of non-SPMRs have begun or will begin training programs.

* 47% of those in training programs are center EMRs, 21% are mainstreamed.

* Food Service programs comprise the largest segment, 26%; Child Care (16%); and Data Processing (16%).

PARENT/GUARDIAN INVOLVEMENT IN TRANSITION PLANNING

Parents utilize several measures to plan and arrange future work placements, including: 1) meeting with (or calling) guidance counselors or teachers, 2) attending a transition planning meeting; 3) contacting government agencies or providers of vocational services, such as training programs and sheltered workshops; 4) through networking and parent groups.

The SPMR Group: 57% of the parents reported that they were not involved in placement planning.

The Non-SPMR Group:

* 59% of the respondents indicated that they participated in transition planning.

* 80% of parents/guardians within the TMR and PH groups indicated some involvement in planning. The lowest participation rates were found among the mainstream (50%), center EMR (52%) and SED/LAP (50%) groups.

* The most frequent planning measures taken by parents include: contacting the Office of Vocational Rehabilitation (36%); meeting with the guidance counselor (25%); and contacting the Allegheny County MH/MR office (17%).

* 11% of the respondents reported that they had attended a transition planning meeting.

* 45% of respondents reported that they had contacted at least one provider agency in the course of transition planning.

* 28% reported that they had contacted school personnel (guidance counselor or teacher) or attended a transition planning meeting.

* The participation rate for respondents from families with annual incomes over $25,000 was 73%; for those with annual incomes below $25,000, 49%. This difference was statistically significant.

* Post-school placements are arranged or in progress for 73% of the individuals whose parents or guardians reported that they were involved in transition planning, and 53% of those whose parents were not involved. This was a statistically significant difference.

* 80% of the completers from families with annual incomes of $25,000 or more have a post-school placement, compared to 57% of those from families with incomes under $25,000. This difference was statistically significant.

CONCLUSIONS

Obstacles to Full Parental Involvement in Transition Planning

* Lower rates of participation in transition planning among lower-income families.

* Lower participation rates among families of mainstream EMRs.

* Lower participation rates among families of center-based EMRs and SED/LAPs.

Comparison of Three Cohorts

* While the 1990 sample differs somewhat in composition from the previous ones, findings suggest that, at this early stage, the groups do not substantially differ in terms of outcomes.

* The 1990 cohort had far fewer individuals in the SPMR group, and significantly more individuals in the PH and SED/LAP groups within the 1990 cohort.

* Differences in the proportions of individuals in various types of living, working and training situations are minor in most instances.

* Although 50% of the 1990 mainstream group is without work, compared to 27% of the 1987 group, the difference is not great enough to be significant.

FOLLOW-UP OF MENTALLY RETARDED 1990 SCHOOL COMPLETERS

The second aspect of the HWPA/CRA project underwritten by the Edith L. Trees Charitable Trust research this year involves following an additional cohort of youngsters, those completing school in the 1989-1990 school year. Youngsters with mental retardation (MR) involvement of any degree who had completed their educations at one of the Allegheny Intermediate Unit's (AIU's) special education centers in the 1989-1990 school year were followed. Also included were youngsters with an MR disability who had been in mainstreamed classes under AIU auspices in regular area high schools who completed school that year. These individuals were all classified educable mentally retarded (EMR). In that they were mainstreamed, these youngster were considered, in general, less handicapped and better able to be integrated than their peers in the special education centers. Students who graduated, received a certificate or left school without official termination were all included in the sample.

Following a new cohort of youngsters just as they are leaving school provides an additional perspective on the school-to-work transition. It provides baseline data against which to measure future outcomes. Findings can also be compared with those of the follow-up of earlier cohorts: those completing school in the 1985-1986 and 1986-1987 school years. Investigation of the situation of recent graduates brings us up to date with new developments and allows us to explore whether the last five years, during which transition received much attention, have made a difference in the post-school careers of mentally retarded young people.

The original plan had been to interview the parents and guardians of the 1990 completers at two points, before and after youngsters had left school. However, this became impossible as the study had to be cleared through channels, which included the Board of Education, in order for us to gain permission to have access to school record information. As this took some months, we were not able to begin the interview process as early as we had anticipated. Accordingly, only a small percentage of interviews took place before graduation. The majority of the sample, then, was interviewed in the summer immediately following graduation.

The Study Subjects

Center completers: Center completers finished their educations at the six special education centers of Allegheny Intermediate Unit during the 1989-1990 school years. These centers, located around the county, serve the handicapped children of the school districts of suburban Allegheny County which are under the auspices of the Allegheny Intermediate Unit. Less disabled youngsters, and those judged able to handle

integration with nondisabled peers, are mainstreamed into district schools. The centers, then, serve the more severely disabled, those with multiple handicaps, those with emotional problems as well as developmental delays, and those otherwise unable to be integrated into a mainstreamed setting. The study population was comprised of all students who left school in 1989-1990 who had any degree of mental retardation (MR), whether as a primary or secondary disability. While in school, the youngsters were classified into exceptionality groups using state standards. Although also based on functional ability and thus, having a 5% leeway, the major groups are determined by I.Q.: Severely Profoundly Mentally Retarded (SPMR) - I.Q. 25 and below; Trainable Mentally Retarded (TMR) - I.Q. range roughly 25+ to 50; Educable Mentally Retarded (EMR) - I.Q. range roughly 50+ to 80. Additional groups are Physically Handicapped (PH), and Social or Emotional Disabled/Learning and Adjustment Problem (SED/LAP). Our study sample only included PH and SED/LAP individuals who were also mentally retarded to some degree.

Mainstreamed students: Mainstreamed students completed their educations in an EMR class under the auspices of the AIU, in one of 12 district high schools. These classes are physically located within a regular high school. These students typically have their own programming within the high school building, but may interact with non-handicapped peers in some non-academic classes, at lunch, extra-curricular activities, and in the normal flow in hallways.

Data Collection: Surveying Parents and Guardians

As with the 1987 and 1988 studies, we first had to obtain permission from the Allegheny Intermediate Unit (AIU) and the Board of Education to collect information about 1989-1990 completers from the school records of the six special education centers. This unexpected procedure slowed down the data collection process The information collected included: 1) demographic information, such as sex and year of birth; vocational data, including school district of origin, completion status, vocational courses and co-op placements; and parent/guardian names, addresses and telephone numbers. In addition, the AIU furnished a list of those who completed mainstream programs at district high schools under AIU auspices. (The AIU's catchment area comprises that portion of Allegheny County which lies outside the city of Pittsburgh.) The phone numbers and addresses of the parents and guardians were checked against listings in telephone directories and Cole's Street Directory to reduce the likelihood of transcription errors. Letters were sent to the parents and guardians explaining the purpose of the study and notifying them that they would be contacted for interviews. The same letter provided a phone number that could be used by parents and guardians who did not wish to be part of the study, with a reasonable grace period within which to call. If any letters were returned because of

expired forwarding orders or wrong addresses, we again checked the addresses and phone numbers against records at the schools and the AIU. Any corrections were recorded in the computer file and the letter was retransmitted. Of the 122 names taken from school records, 2 parents called to indicate that they did not wish to be part of the study.

The remaining parents and guardians were then contacted by phone interviewers. Contacting parents and guardians was the first priority. If necessary, numerous callbacks, at different times of the day and different days of the week, were made to the identified numbers. When necessary, interviews were rescheduled at the interviewee's convenience. In the case of youngsters in group living situations or Community Living Arrangements (CLAs), sometimes an individual in charge, such as a supervisor or counselor was interviewed, sometimes a parent, and sometimes both were interviewed.

Questionnaires were mailed to parents and guardians if any of the following situations occurred: 1) the parent or guardian could not be reached by phone because of a wrong or disconnected number; 2) we could not get an answer after numerous attempts; or 3) the parent or guardian preferred and requested a mail survey. Surveys sent by mail included a postage-paid return envelope. Of the 15 surveys sent by mail, 3 were completed and returned.

The questionnaire was a slightly modified version of the one used in previous years. As before, basic questions were asked about youngster's living arrangement and work situations, including jobs held during the time the youngster was attending school, and post-school placements planned or in progress. In addition, respondents were asked to indicate the subject's marital status and number of children, if any. They were also asked to supply information about the household size, family income and ages of the parents. New questions were added asking parents about their involvement in transition planning for the youngster.

Of the 122 names taken from school records, 4 (all mainstreamed) were disqualified from the study because they are returning to school in the fall. Out of the 118 qualified subjects, 102 surveys were successfully concluded, for a response rate of 86%. As the table on the following page shows, 96 (82%) of the parents and guardians responded to the phone interview, 3 more completed mail surveys, and 3 counselors/supervisors responded by phone. The 16 non-response situations included 11 disconnected/wrong numbers who could not be contacted, 4 refusals, and one parent who requested a mail survey but did not return it.

RESPONSE SUMMARY - 1990 COHORT

Preliminary universe from school records:	122
Disqualified--returning to school in the fall:	-4
Final universe for sample:	118

Respondent situations:	#	(%)
Parent/guardian completed phone interview	96	(82)
Parent/guardian completed follow-up mail survey	3	(2)
Counselor/supervisor responded by phone	3	(2)
Total respondents	102	(86)

Non-respondent situations:	#	(%)
Wrong number/mail survey not returned	6	(5)
Phone disconnected/mail survey not returned	4	(3)
Phone disconnected/mail forwarding expired	1	(1)
Parent requested mail survey - survey not returned	1	(1)
Parent/guardian refused to participate	4	(3)
	16	(14)

TOTAL RESPONDENTS AND NON-RESPONDENTS:	118	(100)

The Study Sample

* Of the 16 lost cases, 8 were center EMRs and 6 were mainstreamed EMRs. 1 was classified as SED, and 1 as TMR. All of those classified as SPMR or PH were retained successfully contacted. (See Comparison of Respondents and Non-respondents, tables on pages 67-68).

* Among the center completers, the response rate for whites (92%) was greater than the response rate for blacks (75%). This situation made little difference in racial configuration of the final sample, which was 89% white compared to the universe which was 88% white. (Data on race was not available for mainstream students).

* The response rate was somewhat lower in the catchment areas of the Mon Valley (76%) and Eastern Area (82%) centers. The rosters from these two schools included many cases from housing projects and low-income communities. Families in these areas have proven to be difficult to locate in each year of the previous studies. The study sample, then, may be somewhat less representative of youngsters whose families are in the lower, than the higher wealth rating categories. By contrast, response rates in areas served by the other four centers ranged from 91% to 100%.

* The characteristics of all respondents are shown in the tables on pages 69 and 70.

COMPARISON OF RESPONDENTS AND NON-RESPONDENTS
Center Completers, 1990 Cohort

	RESPONDED	DID NOT RESPOND	TOTAL	PERCENT RESPONDING
SCHOOL				
Mon Valley	19	6	25	(76)
Eastern Area	9	2	11	(82)
Sunrise	10	1	11	(91)
Middle Road	16	1	17	(94)
Western Hills	8	-	8	(100)
Pathfinder	24	-	24	(100)
WEALTH RATING OF COMMUNITY				
Very High	22	-	22	(100)
High	20	1	21	(95)
Middle	12	2	14	(86)
Low	13	2	15	(87)
Very Low	12	5	17	(71)
Unknown	7	-	7	(100)
PRIMARY EXCEPTIONALITY				
EMR	46	8	54	(85)
TMR	15	1	16	(94)
SPMR	7	-	7	(100)
PH	10	-	10	(100)
SED/LAP	8	1	9	(89)
SEX				
Male	47	8	55	(85)
Female	39	2	41	(95)
RACE				
White	77	7	84	(92)
Black	9	3	12	(75)
Total	86	10	96	(90)

COMPARISON OF RESPONDENTS AND NON-RESPONDENTS
Mainstream Completers, 1990 Cohort

	RESPONDED	DID NOT RESPOND	TOTAL	PERCENT RESPONDING
WEALTH RATING OF COMMUNITY				
Very High	3	1	4	(75)
High	4	1	5	(80)
Middle	1	-	1	(100)
Low	2	2	4	(50)
Very Low	5	1	6	(83)
Unknown	1	1	2	(50)
SEX				
Male	10	3	13	(77)
Female	6	3	9	(67)
Total	16	6	22	(73)

CHARACTERISTICS OF THE 1990 SAMPLE
Center Completers

	#	(%)
School		
Mon Valley	19	(22)
Eastern Area	9	(10)
Sunrise	10	(12)
Middle Road	16	(19)
Western Hills	8	(9)
Pathfinder	24	(28)
Primary Exceptionality		
EMR	46	(53)
TMR	15	(17)
SPMR	7	(8)
SED/LAP	10	(12)
PH	8	(9)
Secondary Disability	#	(%)
SED/LAP	2	(2)
Vision	5	(6)
Hearing	2	(2)
Seizures	2	(2)
Hearing/Speech	1	(1)
Vision/Speech	1	(1)
Subtotal	13	(15)
Race		
White	77	(90)
Black	9	(10)
TOTAL	86	(100)

CHARACTERISTICS OF THE 1990 SAMPLE
Center and Mainstream Completers

	1990 Mainstream #	(%)	1990 Center #	(%)	Total #	(%)
Sex						
Male	10	(63)	47	(55)	57	(56)
Female	6	(38)	39	(45)	45	(44)
Birth Year						
1967			1	(1)	1	(1)
1968			22	(26)	22	(22)
1969	2	(13)	43	(50)	45	(44)
1970	3	(19)	4	(5)	7	(7)
1971	9	(56)	10	(12)	19	(19)
1972	2	(13)	6	(7)	8	(8)
TOTAL	16	(100)	86	(100)	102	(100)

LIVING ARRANGEMENTS

SPMR: The current living arrangements of the 7 SPMR cases in the sample are shown in the table below. 43% live in institutions, 43% live with parents or guardians, and 14% live in group living arrangements or CLAs.

SPMR LIVING ARRANGEMENTS

Living Arrangement	#	(%)
Parent/Guardian	3	(43)
CLA, Group Home	1	(14)
Institution	3	(43)
Total	7	(100)

Total non-SPMR sample: The table on the following page presents the living arrangements for all other groups in the sample. The vast majority (91%) of the total non-SPMR sample lives with parents or guardians, including all of the mainstreamed EMRs. Three others (3%), all center EMRs, live independently. An additional 5 (5%), including 3 TMRs, are living in group situations or CLAs. One person (1%) is living in the dormitory of a proprietary trade school.

NON-SPMR LIVING ARRANGEMENTS
1990 Completers

LIVING ARRANGEMENT	EMR Mainstream #	EMR Mainstream (%)	EMR Center #	EMR Center (%)	TMR #	TMR (%)	PH #	PH (%)	SED/LAP #	SED/LAP (%)	Total #	Total (%)
Parent/Guardian	16	(100)	42	(91)	12	(80)	9	(90)	7	(88)	86	(91)
Independent	-		3	(7)	-		-		-		3	(3)
CLA, Group Home	-		1	(2)	3	(20)	1	(10)	-		5	(5)
Dormitory	-		-		-		-		1	(12)	1	(1)
Total	16	(100)	46	(100)	15	(100)	10	(100)	8	(100)	95	(100)

WORK SITUATIONS

Because the participants in this study were interviewed at different stages in the transition from school to work - i.e., some were already out of school, some were still in school, some had already begun their post-school work or training placements - the findings in this section are handled somewhat differently from the previous follow-up studies. For this report, post-school work situations refer to those that are: 1) in progress at the time of the interview, or 2) imminent, i.e., arrangements are definite and placements are scheduled to begin within a few months of the interview. Two types of work situations have been added for the 1990 cohort: 1) summer jobs (those designated to end before September), and 2) combinations of work and training, in which the duration of the work is for the summer and the training portion is scheduled to begin in the fall.

As in previous studies, the work situations of the SPMR group and the non-SPMR groups will be considered separately, followed by a detailed examination of the work situations of the TMR and EMR groups.

The SPMR Group: Five (71%) of the 7 individuals in the SPMR group are attending activities programs, including the 4 in group residences or institutions, as well as 1 who lives with parents. Two are not attending activities programs; both live at home.

ATTENDANCE AT ACTIVITY CENTER BY LIVING ARRANGEMENT, SPMRs

	Parent or Guardian	CLA	Institution	Total #	Total (%)
Attending Activities Center	1	1	3	5	(71)
Not Attending Activities Center	2	-	-	2	(29)
	3	1	3	7	(100)

Total Non-SPMR Group: Highlights of the findings regarding the post-school placements of the non-SPMR group are listed below. These are derived from, and refer to, the complete table of post-school placements which appears on the next page.

* Post-school work placements have been arranged for 63 (64%) of the non-SPMR completers.

* 38 persons (40% of the non-SPMR sample) have placements involving competitive employment, which includes regular jobs, supported work, and summer jobs.

* 19 persons (20%) have training placements planned or in progress. 12 of these plan to enter training programs after working in summer jobs.

* 9 persons in the sample (10%) are placed in work situations that are only for the summer. Thus, for 4 persons in designated summer jobs, and 5 persons in summer activities centers and workshops, there are no planned placements beyond August of 1990.

* Just over one-third (34%) of all the non-SPMR completers have no arrangements for post-school work placements.

* The proportion of completers without a post-school placement differs by exceptionality. For center completers, the proportions range from 12% for those in the SED/LAP group to 40% for those in the PH group. However, half (50%) of the mainstream EMRs are without a placement.

NON-SPMR POST-SCHOOL WORK SITUATIONS

POST-SCHOOL WORK SITUATION	EMR Mainstream #	EMR Mainstream (%)	EMR Center #	EMR Center (%)	TMR #	TMR (%)	PH #	PH (%)	SED/LAP #	SED/LAP (%)	Total #	Total (%)
Regular job	3	(19)	16	(35)	1	(7)	1	(10)	-		21	(22)
Supported work	-		-		-		-		1	(12)	1	(1)
Work, then training	2	(12)	6	(13)	1	(7)	2	(20)	1	(12)	12	(13)
Summer job only	1	(6)	2	(4)	-		-		1	(12)	4	(4)
Training only	2	(12)	3	(6)	-		-		2	(25)	7	(7)
Sheltered workshop	-		2	(4)	3	(20)	3	(30)	-		8	(8)
Activities center	-		1	(2)	3	(20)	-		1	(12)	5	(5)
Summer AC/workshop	-		1	(2)	3	(20)	-		1	(12)	5	(5)
No work placement	8	(50)	15	(33)	4	(27)	4	(40)	1	(12)	32	(34)
Total	16	(100)	46	(100)	15	(100)	10	(100)	8	(100)	95	(100)

JOB PLACEMENTS

For the purposes of this discussion, job placements include: 1) in-school job placements, those held by the completer while attending school, and 2) post-school job placements, arranged or in progress at the time of the interview. As the table below indicates, one-third (33%) of the individuals in the non-SPMR group have both in-school job experience and post-school job placements. An additional 18% had a job placement while in school, but have no post-school job planned. At the same time, 7 persons (7%) did not have a job placement while in school, but have a post-school job placement arranged. The remaining 42% of the completers have neither in-school job experience nor post-school job placements. Sixteen members (35%) of the center EMR group and 7 members (44%) of the mainstream EMR group do not have jobs.

TOTAL JOB PLACEMENTS, BY TYPE AND EXCEPTIONALITY

	EMR									
	Mainstream		Center		TMR		PH/SED		Total	
Job Placements	#	(%)	#	(%)	#	(%)	#	(%)	#	(%)
In-school/Post-school	4	(25)	21	(46)	-		6	(33)	31	(33)
In-School Only	3	(19)	6	(13)	3	(20)	5	(28)	17	(18)
Post-School Only	2	(13)	3	(7)	2	(13)	-		7	(7)
None	7	(44)	16	(35)	10	(67)	7	(39)	40	(42)
Total	16	(100)	46	(100)	15	(100)	18	(100)	95	(100)

The remainder of this section is devoted to separate discussions of in-school jobs and post-school jobs.

In-school Job Placements

Three types of job placements are considered in this discussion of in-school jobs: 1) regular jobs, i.e., jobs in the community which are open to all applicants; 2) co-op jobs, placements arranged for students through the school system, which may involve work on school grounds or in the larger community; and 3) supported work. 48 (51%) of the 95 members of the non-SPMR group held one of these types of jobs while attending school. As shown in the table below, nearly two-thirds (65%) of all the jobs were co-op placements. Within the mainstream group, however, the majority (71%) held regular jobs while only 29% were placed in co-op jobs. One person was engaged in a supported work placement.

TYPE OF IN-SCHOOL JOB PLACEMENTS, BY EXCEPTIONALITY

TYPE OF JOB PLACEMENT	EMR Mainstream #	EMR Mainstream (%)	EMR Center #	EMR Center (%)	TMR #	TMR (%)	PH #	PH (%)	SED/LAP #	SED/LAP (%)	Total #	Total (%)
Co-op	2	(29)	18	(67)	2	(67)	4	(80)	5	(83)	31	(65)
Supported	-		-		-		-		1	(17)	1	(2)
Regular	5	(71)	9	(33)	1	(33)	1	(20)	-		16	(33)
Total	7	(100)	27	(100)	3	(100)	5	(100)	6	(100)	48	(100)

There was a negligible difference between co-op or supported work and regular jobs with regard to the number of hours worked per week. Co-op and supported workers averaged 16.25 hours/week, while those in regular jobs averaged 15.92 hours/week.

WEEKLY HOURS WORKED BY TYPE OF IN-SCHOOL JOB

Hours/week	Co-op or Supported #	Co-op or Supported (%)	Regular #	Regular (%)	Total #	Total (%)
10 or less	7	(22)	4	(25)	11	(23)
13 - 18	10	(31)	5	(31)	15	(31)
20 - 24	9	(28)	3	(19)	12	(25)
25 - 30	2	(6)	2	(13)	4	(8)
Not specified	4	(13)	2	(13)	6	(13)
Total	32	(100)	16	(100)	48	(100)
Average hrs/week:	16.25		15.92		16.14	

A large proportion (42%) of the jobs held while attending school consisted of placements in the restaurant/fast food sector. However, while 69% of those with regular jobs were working in this sector, only 28% of those with co-op/supported jobs were similarly placed. More than one-third (34%) of the co-op jobs consisted of placements at one of the six special education centers. These included janitorial and cafeteria workers, as well as teacher aides, clerical assistants, and one messenger. Supermarkets and grocery stores provided approximately one-fifth of all co-op placements (22%) and regular jobs (19%). Other job placements included child care aides, janitors and an auto body worker.

TYPES OF JOBS HELD WHILE ATTENDING SCHOOL

TYPES OF JOBS	Co-op or Supported #	(%)	Regular #	(%)	Total #	(%)
Restaurant/Fast Food	9	(28)	11	(69)	20	(42)
Busperson	2	(6)	2	(13)	4	(8)
Dishwasher	-		3	(19)	3	(6)
Cook	1	(3)	2	(13)	3	(6)
Miscellaneous	6	(19)	4	(25)	10	(21)
Special Educ. Centers	11	(34)	-		11	(23)
Janitor	4	(13)	-		4	(8)
Cafeteria worker	3	(9)	-		3	(6)
Clerical	2	(6)	-		2	(4)
Teacher Aide	1	(3)	-		1	(2)
Messenger	1	(3)	-		1	(2)
Supermarket/Grocery	7	(22)	3	(19)	10	(21)
Bagger	3	(9)	-		3	(6)
Cashier/Bagger	1	(3)	1	(6)	2	(4)
Cashier/Clerk	1	(3)	1	(6)	2	(4)
Laborer	1	(3)	1	(6)	2	(4)
Stock Clerk	1	(3)	-		1	(2)
Other	5	(16)	2	(13)	7	(15)
Day Care Aide	3	(9)	-		3	(6)
Janitor	1	(3)	2	(13)	3	(6)
Auto Body Repair	1	(3)	-		1	(2)
Total	32	(100)	16	(100)	48	(100)

There were some differences between regular jobs and co-op or supported placements with regard to compensation. These differences primarily stemmed from certain co-op placements in special education centers and day care centers, for which the hourly wage was $1.00 to $1.20. Thus, the average wage for regular jobs was $3.91, compared to an average of $2.29 for the co-op and supported positions. However, if the jobs in the $1.00 - $1.20 category are excluded, the wage rates appear closer: $3.78 for co-op and supported work, $3.91 for regular jobs. The one supported work placement paid $3.80/hour.

HOURLY WAGES PAID TO THOSE WITH JOBS WHILE IN SCHOOL

Hourly Rate	Co-op or Supported #	(%)	Regular #	(%)	Total #	(%)
$1.00 - $1.20*	7	(22)	-		7	(15)
$3.25 - $3.50	2	(6)	1	(6)	3	(6)
$3.70 - $3.95	16	(50)	8	(50)	24	(50)
$4.00 - $4.50	1	(3)	5	(31)	6	(13)
Not known	6	(19)	2	(13)	8	(17)
Total	32	(100)	16	(100)	48	(100)
Average, known wages:	$2.29		$3.91		$2.85	
Average, excluding*:	$3.78		$3.91		$3.83	

Schools provided a vital link in the placement of students in jobs. As shown below, schools provided information or referral for 85% of the in-school job placements, including most (56%) of the regular jobs and all of the co-op and supported work placements. Four (8%) of the students found jobs through family members, while 3 (6%) found jobs on their own.

SOURCES OF INFORMATION OR REFERRAL FOR JOBS HELD WHILE IN SCHOOL

	Co-op or Supported #	(%)	Regular #	(%)	Total #	(%)
School	32	(100)	9	(56)	41	(85)
Family member	-		4	(25)	4	(8)
Student (self)	-		3	(19)	3	(6)
Total	32	(100)	16	(100)	48	(100)

Continuation of In-school Jobs: At the time of the interview, some students were still in school, while others had just completed. Just over one-third (35%) of all those who had jobs while in school were either planning to retain or were currently involved in their job placements after completing school. However, the placements differ considerably between those who had co-op or supported work and those who had regular jobs. In-school jobs are being retained by half (50%) of those with regular jobs, but 29% of those in co-op placements. Two respondents were undecided about continuation at the time of the interview.

CONTINUATION OF IN-SCHOOL JOB PLACEMENTS AFTER COMPLETION

	Type of In-school Job							
	Co-op		Supported		Regular		TOTAL	
Continuation Plans	#	(%)	#	(%)	#	(%)	#	(%)
Will continue	9	(29)	-		8	(50)	17	(35)
Will not continue	22	(71)	1	(100)	6	(38)	29	(60)
Not sure	-		-		2	(12)	2	(5)
	31	(100)	1	(100)	16	(100)	48	(100)

Most (62%) of those who worked while in school have a new post-school placement arranged. As the table below shows, 86% of those who did not continue the job they held while in school have a new post-school placement arranged. At the same time, 5 (29%) of those who did continue their schooltime jobs also have post-school placements planned. These 5 have training program placements arranged for the fall, and plan to continue their jobs through the summer.

JOB CONTINUATION AND POST-SCHOOL PLACEMENT PLANS

	Continue In-school Job?							
	No		Yes		Not Sure		TOTAL	
New Post-school Placement?	#	(%)	#	(%)	#	(%)	#	(%)
Yes	25	(86)	5	(29)	-		30	(62)
No	4	(14)	12	(71)	2	(100)	18	(38)
	29	(100)	17	(100)	2	(100)	48	(100)

This report will now turn to a discussion of post-school job placements.

Post-school Job Placements

Post-school job placements include regular jobs, summer jobs and supported work. Within the 1990 cohort, jobholders are found mainly in the EMR group, both center (63%) and mainstream (16%). As seen in the table below, the remaining 21% of the jobholders include individuals from the PH, SED/LAP and TMR groups.

EXCEPTIONALITY OF THOSE WITH JOBS

Exceptionality	#	(%)
Mainstream EMR:	6	(16)
Center:		
EMR	24	(63)
PH	3	(8)
SED/LAP	3	(8)
TMR	2	(5)
Total	38	(100)

As noted earlier, a number of jobholders are participating in summer work programs or plan to continue their jobs only through the summer. Of the 38 who have job placements, 16 (42%) have summer jobs: 12 will go on to start training programs in the fall; the remaining 4 will have no planned placement beyond the end of August. The remaining 22 jobholders have permanent placements; they have no new placements planned for the future, such as training programs or new jobs.

As the table below indicates, there are notable differences between summer job placements and permanent placements with regard to work type and work site. For example, 7 (44%) of the 16 summer jobs involve work at a number of area schools. Included in this group are 2 completers who found work at Allegheny Valley School, one as a laundry worker and another as a teacher's aide. 5 others obtained temporary janitorial positions through a program sponsored by the Diocese of Pittsburgh. Through another program, 2 youngsters were placed in jobs as day camp counselors with local YMCAs.

The permanent job placements involve a wide range of jobs and work sites. The largest single group of jobs (36%) are those at restaurants and fast food outlets.

TYPES OF POST-SCHOOL JOB PLACEMENTS

	Type of Post-School Job					
	Permanent		Summer		Total	
TYPES OF JOBS	#	(%)	#	(%)	#	(%)
Schools	2	(9)	7	(44)	9	(24)
Janitor	2	(9)	5	(31)	7	(18)
Teacher Aide	-		1	(6)	1	(3)
Laundry Worker	-		1	(6)	1	(3)
Restaurant/fast food:	8	(36)	3	(19)	11	(29)
Busperson	3	(14)	1	(6)	4	(11)
Cook	2	(9)	-		2	(5)
Dishwasher	1	(5)	-		1	(3)
Miscellaneous	2	(9)	2	(13)	4	(11)
Other:	12	(55)	6	(38)	18	(47)
Cashier/Bagger	2	(9)	1	(6)	3	(8)
Clerical	1	(5)	1	(6)	2	(5)
Day Camp Counselor	-		2	(13)	2	(5)
Landscaper	2	(9)	-		2	(5)
Auto Body Repair	1	(5)	-		1	(3)
Bagger	1	(5)	-		1	(3)
Carpenter	1	(5)	-		1	(3)
Drug Store Clerk	1	(5)	-		1	(3)
Farmer	1	(5)	-		1	(3)
Janitor	1	(5)	-		1	(3)
Laborer	1	(5)	-		1	(3)
Not specified	-		2	(13)	2	(5)
Total	22	(100)	16	(100)	38	(100)

The majority (63%) of job placements involve part-time work (less than 35 hours per week). 18 (47%) of the 38 jobs entail 20-34 hours per week, while 6 (16%) require less than 20 hours per week. Summer jobs average 33.14 hours per week, compared to 25.25 hours per week for the permanent job placements. The difference is mainly found in the relatively smaller proportion of summer jobs entailing fewer than 20 hours per week.

HOURS WORKED BY TYPE OF JOB PLACEMENT

	Permanent		Summer		Total	
	#	(%)	#	(%)	#	(%)
Less than 20	5	(23)	1	(6)	6	(16)
20 - 34	10	(45)	8	(50)	18	(47)
35 - 40	5	(23)	6	(38)	11	(29)
Not known	2	(9)	1	(6)	3	(8)
Total	22	(100)	16	(100)	38	(100)
Average:	25.25		33.14		28.63	

The average wage for jobholders is $3.96/hour. Summer workers have a slightly lower average wage ($3.89) than other workers ($4.01), but a large proportion respondents for the summer jobholders (31%) could not specify the rate of compensation.

HOURLY WAGES RECEIVED, BY TYPE OF JOB PLACEMENT

	Permanent		Summer		Total	
Hourly Rate	#	(%)	#	(%)	#	(%)
Less than $3.70	1	(4)	-		1	(3)
$3.70 - 3.75	8	(36)	4	(25)	12	(32)
$3.80 - $4.00	6	(27)	4	(25)	13	(34)
Over $4.00	5	(18)	3	(19)	8	(13)
Not known	2	(9)	5	(31)	7	(16)
Total	22	(100)	16	(100)	38	(100)
Average Wage:	$4.01		$3.89		$3.96	

Schools were an important source of job information and referral for completers, assisting in 82% of the 16 summer jobs and 50% of the permanent jobs. Help from family members or friends was instrumental in 36% of jobs with permanent placements.

SOURCES OF INFORMATION AND REFERRAL, BY TYPE OF JOB PLACEMENT

	Permanent		Summer		Total	
	#	(%)	#	(%)	#	(%)
School	11	(50)	13	(82)	24	(63)
Friend/family member	8	(36)	-		8	(21)
Student (self)	2	(9)	1	(6)	3	(8)
Diocese of Pgh.	-		1	(6)	1	(3)
Not known	1	(5)	1	(6)	2	(5)
Total	22	(100)	16	(100)	38	(100)

The vast majority (85%) of the job placements involve daytime work only. Only 10% of jobholders work evening or variable shifts. There are no significant differences between regular jobs and summer jobs.

SHIFT WORKED BY TYPE OF JOB PLACEMENT

	Permanent		Summer		Total	
	#	(%)	#	(%)	#	(%)
Day	18	(82)	14	(88)	32	(85)
Evening	2	(9)	-		2	(5)
Varies	1	(5)	1	(6)	2	(5)
Not known	1	(5)	1	(6)	2	(5)
Total	22	(100)	16	(100)	38	(100)

POST-SCHOOL TRAINING

One of the more notable features about the 1990 cohort is the large number of persons with post-school training programs either planned or in progress. 19 of the completers, or 20% of the non-SPMR contingent, have begun or will begin training programs at a variety of sites. As the table below shows, nearly half (47%) of those in training programs are from the center EMR group, while 4 (21%) are from the mainstream group. About one-third of the trainees are distributed among the SED/LAP (16%), PH (11%), and TMR groups (5%).

EXCEPTIONALITY OF THOSE WITH TRAINING PLACEMENTS

Exceptionality	#	(%)
Mainstream	4	(21)
Center:		
EMR	9	(47)
SED/LAP	3	(16)
PH	2	(11)
TMR	1	(5)
Total	19	(100)

Within the 1990 group of trainees, those enrolled in Food Service programs comprise the largest segment, 26%. However, Child Care (16%) and Data Processing (16%) courses are also well represented. Training subjects not encountered in our previous studies but included with this group are Carpentry and Laundry Work. All courses planned or in progress are shown below.

SUBJECT OF POST-SCHOOL TRAINING PROGRAMS, BY EXCEPTIONALITY

Training Subject	EMR		TMR	PH/SED	Total	
	Mainstream	Center			#	(%)
Food Service	1	3	-	1	5	(26)
Child Care	1	2	-	-	3	(16)
Data Processing	-	2	-	1	3	(16)
Janitorial	-	1	-	1	2	(11)
Clerical	-	1	-	1	2	(11)
Mechanic	-	-	-	1	1	(5)
Social Service Aide	1	-	-	-	1	(5)
Carpentry	1	-	-	-	1	(5)
Laundry Work	-	-	1	-	1	(5)
	4	9	1	5	19	(100)

PARENT/GUARDIAN INVOLVEMENT IN TRANSITION PLANNING

Parent involvement is comprised of several measures that parents and guardians utilize to plan and arrange future work placements. These may include efforts made in conjunction with staff members of the schools, such as: 1) meeting with (or calling) guidance counselors or teachers, or 2) attending a transition planning meeting. Contacting government agencies, such as the Office of Vocational Rehabilitation (OVR) and Allegheny County MH/MR, or providers of vocational services, such as training programs and sheltered workshops, may also be features of transition planning. Finally, parents may pursue planning efforts by themselves, through networking and parent groups. These steps were among those mentioned by respondents who indicated that they were involved in planning post-school placements for their youngsters. Planning efforts for the SPMR group and the non-SPMR group are discussed here separately.

The SPMR Group: 4 out of 7 (57%) of those in the SPMR group are living in a CLA or an institution. As part of their residential arrangements, these 4 all participate in structured daytime activities. The parents of these individuals reported that they were not involved in placement planning.

The remaining 3 individuals live at home with their parents. Only 1 parent reported any involvement in post-school planning; the youngster is currently enrolled in an activities center after having her name on a waiting list for 3 years. Two parents indicated that they were not involved in any placement planning, and their youngsters are without a placement. One of these parents was not interested in a post-school placement for her daughter; another parent reported that he was interested in a day treatment program but did not know how to access further help.

The Non-SPMR Group: A summary of the responses for the non-SPMR group appears in the table on the next page. (Parents were invited to cite any and all methods used, so multiple responses were accepted. For this reason, the percentages within each exceptionality group may add up to more than 100%.)

The table reveals the following about parental involvement in transition planning:

* Most (59%) of the respondents indicated that they participated in transition planning through at least one of the means listed in the table.

* The highest proportion of parents who indicated some involvement in planning, 80%, was found within the TMR and PH groups. The lowest proportions were found among

PARENT/GUARDIAN INVOLVEMENT IN TRANSITION PLANNING

Parent/guardian involvement in transition planning	EMR Mainstream (N=16) %	EMR Center (N=46) %	TMR (N=15) %	PH (N=10) %	SED/LAP (N=8) %	Total (N=95) %
Parent/guardian involved, steps taken:	50	52	80	80	50	59
Met with counselor	6	24	40	40	25	25
Attended transition meeting	-	2	33	20	25	11
Met with teacher	-	2	-	10	-	2
Met with representative of:						
Office of Voc. Rehabilitation	31	33	40	50	38	36
Allegheny Co. MH/MR	-	4	47	40	38	17
Training program	6	-	7	10	-	3
Sheltered workshop	-	2	7	10	-	3
Pgh. Blind Association	-	-	-	10	-	1
Parent's own initiative	-	7	7	-	-	4
Attended meeting of P/G group	-	-	7	-	-	1
Arranged evaluation	-	2	-	-	-	1
Other, unspecified	13	-	-	-	-	2
Parent not involved	50	43	20	20	38	38
Parent involvement unknown	-	4	-	-	13	3

the mainstream (50%), center EMR (52%) and SED/LAP (50%) groups.

* The most frequent planning measures taken by parents include: contacting the Office of Vocational Rehabilitation (36%); meeting with the guidance counselor (25%); and contacting the Allegheny County MH/MR office (17%).

* 11% of the respondents reported that they had attended a transition planning meeting. The rates of participation in these meetings ranged from 2% for the center EMR group to 33% for the TMR group.

Further examination of the involvement of parents and guardians in the transition planning process yields the following findings:

* Parental involvement in transition planning differed significantly with family income. 73% of the respondents from families with annual incomes over $25,000 participated in planning a post-school placement for their youngsters, compared to 49% for those with annual incomes below $25,000.

PARENTAL INVOLVEMENT IN PLANNING, BY FAMILY INCOME

Any Parental Involvement In Planning?	Annual Family Income: Less than $25,000 #	(%)	$25,000 or more #	(%)	Total* #	(%)
Yes	26	(49)	22	(73)	48	(58)
No	27	(51)	8	(27)	35	(42)
TOTAL	53	(100)	30	(100)	83	(100)

$X^2 = 4.62$ $p = .031$

*12 cases are excluded because family income or parental involvement is unknown.

* 43 (45%) of the respondents reported that in the course of transition planning they had contacted at least one provider agency (MH/MR, OVR, training programs and workshops, etc.).

* 27 (28%) of the respondents reported that they had contacted school personnel (guidance counselor or teacher) or attended a transition planning meeting.

* Placement status is positively associated with parent involvement in transition planning. 73% of the individuals whose parents or guardians reported that they were involved in transition planning have a post-school placement arranged or in progress. 53% of those whose parents were not involved have a post-school placement. This association is statistically significant.

POST-SCHOOL PLACEMENT BY PARENTAL INVOLVEMENT

Placement Status	Parent Involved NO #	NO (%)	YES #	YES (%)	Total* #	Total* (%)
With Placement	19	(53)	41	(73)	60	(65)
No Placement	17	(47)	15	(27)	32	(35)
TOTAL	36	(100)	56	(100)	92	(100)

$X^2 = 4.03 \quad p = .045$

*3 cases are excluded because parent did not respond.

* There is a significant positive association between family income and post-school placement status. 80% of the completers from families with annual incomes of $25,000 or more have a post-school placement, compared to 57% of those from families with incomes under $25,000.

POST-SCHOOL PLACEMENT BY FAMILY INCOME

Placement Status	Annual Family Income: Less than $25,000 #	Less than $25,000 (%)	$25,000 or more #	$25,000 or more (%)	Total* #	Total* (%)
With Placement	31	(57)	24	(80)	55	(66)
No Placement	23	(47)	6	(20)	29	(34)
TOTAL	54	(100)	30	(100)	84	(100)

$X^2 = 4.35 \quad p = .037$

*11 cases are excluded because family income is unknown.

Summary: The post-school placement situation for the 1990 cohort is generally positive. Nearly two thirds (66%) of the persons in the non-SPMR sample, and 71% of those in the SPMR sample, have a post-school placement in progress or arranged. There are also positive indications concerning the involvement of parents in the transition planning process: nearly 60% have indicated some kind of planning involvement. It is difficult to make an assessment of the planning process based only on the data in this study, since many subjective factors are involved: the quality and frequency of agency contacts, the parents' understanding of available options, etc. However, the data do suggest some potential problems within the area of transition planning that may require some further exploration and assessment. Some obstacles to full parental involvement in transition planning, as supported by our findings, include:

* Lower participation rates among lower-income families

* Lower participation rates among families of mainstream EMRs

* Lower participation rates among families of center-based EMRs and SED/LAPs.

COMPARISON OF THE THREE COHORTS

Having examined the living arrangements and work situations of the 1990 cohort, we now consider question of whether the circumstances of the members of this cohort differ significantly from those of cohorts previously studied in this research: 1986 and 1987 completers. It will be shown that while the 1990 sample differs somewhat in composition from the previous ones, findings suggest that, at this early stage, the groups do not substantially differ in terms of outcomes.

This section focuses on three factors related to the transition from school to adult life: living arrangements, work placements and training. These three situations will be examined for the most recent group of completers, the 1990 cohort, and compared with those of the previous follow-up groups, the 1986 and 1987 completers. For each group, the data used is drawn from the first interview conducted after the individuals completed school.

Throughout this comparison, it should be kept in mind that that the approach to the study of the 1990 cohort differed in two important ways from that used in in the follow-up of the 1986 and 1987 cohorts. First, the parents and guardians of the 1990 completers were contacted at the time of completion, or shortly thereafter; those of the 1986 and 1987 cohorts were interviewed one year after completion, in 1987 and 1988 respectively. Secondly, the work placements described for the 1990 completers were, at the time of the interview, in-progress or planned (e.g., a training program scheduled to begin within a few months); the work placements of the 1986 and 1987 cohorts were in-progress only.

It should also be noted that the 1990 cohort differed from both the 1986 and the 1987 cohorts with respect to the proportional representation of each exceptionality group. For example, looking at the table on the following page, we can see that the 1990 center-based cohort contains a larger EMR group (53%) than the 1986 and 1987 cohorts (35% and 47%, respectively). At the same time, the 1990 cohort shows a smaller TMR group (17%) than is found in the 1986 and 1987 cohorts (34% and 35%, respectively). These differences are notable, but not statistically significant.

It is significant that the 1990 cohort contains a higher proportion of persons in the PH and SED/LAP classifications. Eighteen (21%) of the 86 members of the 1990 non-SPMR center cohort are classified PH or SED/LAP. Only 12 (8%) of the combined 152-member 1986 and 1987 cohorts are so classified.

In addition, the 1990 SPMR group, containing 7 members, is the smallest among the three cohorts. In part, this may be attributable to recent changes in the residential arrangements of

institutionalized mentally retarded older adults in other counties. Some of these older persons have been relocated to community living arrangements within Allegheny County, while some younger persons have been relocated to residences outside Allegheny County. One result is that fewer SPMR completers were enrolled in the six AIU centers. Because of the difference in the representation of SPMRs within each cohort, the outcome variables for center completers will be compared for those in the non-SPMR category only. Mainstreamed completers from 1987 and 1990 will be compared separately.

1986, 1987 AND 1990 CENTER COMPLETERS, BY PRIMARY EXCEPTIONALITY

Primary Exceptionality	1986 Cohort #	(%)	1987 Cohort #	(%)	1990 Cohort #	(%)	Total #	(%)
EMR	28	(35)	34	(47)	46	(53)	108	(45)
TMR	27	(34)	25	(35)	15	(17)	67	(28)
SPMR	16	(20)	10	(14)	7	(8)	33	(14)
PH	3	(4)	1	(1)	8	(9)	12	(5)
SED/LAP	6	(8)	2	(3)	10	(12)	18	(8)
TOTAL	80	(100)	72	(100)	86	(100)	238	(100)

Members of each center cohort also had secondary exceptionalities consisting of various physical or emotional disabilities. The proportions within each cohort were virtually the same: 1986 (14%); 1987 (14%); and 1990 (15%).

Only two cohorts of individuals who were mainstreamed were included in the study: 1987 and 1990. The samples for each year were different in number - 30 in 1987, 16 in 1990. With only two years to compare, it is not possible to assess trends or significance inherent in these numbers.

The demographic characteristics of the cohorts - race and sex - were not significantly different.

Living Arrangements

As the table below shows, first-year living arrangements did not differ significantly among the three cohorts. Between 84% and 89% of each group lived with their parents or guardians. The proportions living in other arrangements were small and not notably different.

FIRST-YEAR LIVING ARRANGEMENTS OF CENTER NON-SPMRs, 1986,1987 AND 1990

Living Arrangements	1986 #	1986 (%)	1987 #	1987 (%)	1990 #	1990 (%)	Total #	Total (%)
Parent/guardian	53	(84)	52	(84)	70	(89)	175	(86)
Independent	2	(3)	2	(3)	3	(4)	7	(3)
Other relative	1	(2)	2	(3)	-		3	(1)
CIA	4	(6)	3	(5)	5	(6)	12	(6)
Institution	2	(3)	3	(5)	-		5	(2)
Dormitory	-		-		1	(1)	1	(0)
Unknown	1	(2)	-		-		1	(0)
TOTAL	63	(100)	62	(100)	79	(100)	204	(100)

First-year living arrangements for the 1990 mainstream cohort fell into two categories: parent/guardian (80%) and independent (20%). Members of the 1990 cohort were all living with parents or guardians. Again, it must be remembered that the 1990 cohort had just completed school, while the 1987 cohort had been out of school for one year.

FIRST-YEAR LIVING ARRANGEMENTS OF MAINSTREAM EMRs, 1987 AND 1990

Living Arrangements	1987 Cohort #	1987 Cohort (%)	1990 Cohort #	1990 Cohort (%)	Total #	Total (%)
Parent/guardian	24	(80)	16	(100)	40	(87)
Independent	6	(20)	-		6	(13)
TOTAL	30	(100)	16	(100)	46	(100)

Work Placements

Comparison of first-year work placements for the three cohorts is made difficult by the fact that a large number of individuals in the 1990 cohort had summer placements at the time of the interview. These types of summer placements (jobs, activities centers, and workshops) were not relevant to the situations of those in the 1986 and 1987 cohorts. Furthermore, many of those in summer placements planned to go on to other work placements, such as training programs, while others had no planned placement beyond summer. When these possibilities are taken into account, there is found to be no significant difference between the work placements of the 1990 cohort and those of the 1986 and 1987 cohorts.

FIRST-YEAR WORK SITUATIONS OF CENTER NON-SPMRs, 1986, 1987, AND 1990

Work Situation	1986 #	1986 (%)	1987 #	1987 (%)	1990 #	1990 (%)	Total #	Total (%)
Regular job	15	(24)	14	(23)	18	(23)	47	(23)
Supported Work	-		3	(5)	1	(1)	4	(2)
Summer job	-		-		13	(16)	13	(6)
Training	4	(6)	2	(3)	5	(6)	11	(5)
Sheltered Workshop	9	(14)	8	(13)	8	(10)	25	(12)
Activities Center	11	(17)	9	(15)	5	(6)	25	(12)
Summer AC/workshop	-		-		5	(6)	5	(2)
Volunteer	2	(3)	-		-		2	(1)
Idle	22	(35)	25	(40)	24	(30)	71	(35)
TOTAL	63	(100)	62	(100)	79	(100)	204	(100)

Although half (50%) of the 1990 mainstream group is without work, compared to 27% of the 1987 group, the difference is not great enough to be significant. The comparison is again complicated, although to a lesser degree, by the 19% of the 1990 cohort in summer job placements.

FIRST-YEAR WORK SITUATIONS OF MAINSTREAM EMRs, 1987 AND 1990

Work Situation	1987 Cohort #	1987 Cohort (%)	1990 Cohort #	1990 Cohort (%)	Total #	Total (%)
Regular job	17	(57)	3	(19)	20	(43)
Summer job	-		3	(19)	3	(7)
Training	5	(17)	2	(13)	7	(15)
Idle	8	(27)	8	(50)	16	(35)
Unknown	1	(3)	-		1	(2)
TOTAL	30	(100)	16	(100)	46	(100)

Training

At the time of the interview, only 2 individuals from the 1990 center non-SPMR cohort were in training programs. However, 13 others had training programs scheduled for the fall of 1990. In looking at the total number of training programs planned, in progress, or completed, we find that there is little difference between the 1990 cohort (19%) and the 1986 and 1987 cohorts (16% and 10%, respectively) in the proportion of members with some type of training involvement.

TRAINING STATUS OF NON-SPMR CENTER COMPLETERS

Post-school Training Status	1986 (N=63)	1987 (N=62)	1990 (N=79)
In progress	5	2	2
Completed	5	4	-
Planned	-	-	13
TOTAL	10	6	15
% of Cohort:	16%	10%	19%

Four (25%) of the 16 mainstream completers had training programs in progress or planned at the time of the first survey. Although 10 individuals from the 1987 cohort either had completed or were enrolled in training programs, this figure was 33% of the 30 members of the cohort, not significantly different from the 1990 cohort.

TRAINING STATUS OF MAINSTREAM COMPLETERS

Post-school Training Status	1987 (N=30)	1990 (N=16)
In progress	8	1
Completed	2	-
Planned	-	3
TOTAL	10	4
% of Cohort:	33%	25%

Summary: In terms of the composition of the cohorts, significant differences were found between the 1990 group on one hand and the 1986 and 1987 groups on the other. The 1990 cohort had far fewer individuals in the SPMR group, probably resulting from changes in inter-county residential arrangements. There were also significantly more individuals in the PH and SED/LAP groups within the 1990 cohort.

With regard to outcomes for members of these groups, differences in the proportions of individuals in various types of living, working and training situations are minor in most instances. While some major differences appear in the data, they not deemed to be of statistical significance.

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APPENDIX

TRANSITION SERVICES AT ALLEGHENY INTERMEDIATE UNIT

by

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Transition planning services in Allegheny county are a dynamic and changing entity, the result of increased federal, state and local emphasis on employment, recreation and independent living outcomes for individuals with disabilities. Services are currently provided by both the school districts and the Allegheny Intermediate Unit. Planning services take the form of job preparation, training, and formal transition planning meetings. Here, referral to adult service providers and dissemination of information concerning adult service options occur. The purpose of these activities are to serve as a "bridge" between entitled educational opportunities and adult services, which operate under a system of eligibility.

The rationale and need for transition planning is evidenced by the unacceptable results obtained from the traditional referral process between special education and adult services. One state wide survey indicates that 50-70% of special education graduates are unemployed. Currently this process is hampered by long waiting lists for most adult service options. A review of the 1988-89 Consolidated Community Reports compiled by the Department of Public Welfare, shows waiting lists of over 350 individuals for traditional adult facility programs in Allegheny County. A survey completed by Community Research Associates in 1988 indicates that 22% of TMR graduates were neither employed nor involved in any type of training or vocational programming years following graduation. National studies focusing on the unsuccessful transition between school and independent adult life cite other reasons as well, these include: failure to provide comprehensive training in community settings during high school years (Bates, 1986; Wehman, Kregal & Seyfarth, 1985; Wilcox & Bellamy, 1982), financial disincentives (Conley, Noble & Elder, 1986), parental fears (Turnbull & Turnbull, 1988) lack of interagency cooperation (Stooden & Boone, 1987) and transportation. The Pennsylvania Department of Education Statistical Summary of 1987 indicates that there are 60,000 students between the ages of fourteen and twenty-one who will require some level of transition services to achieve to a more independent lifestyle.

In January of 1989, a state level transition advisory committee was established to discuss issues regarding the transition from school to work for special education students. Drawing its membership from the Bureau of Special Education, Instructional Support Centers, Intermediate Units and university

based technical assistance centers, the Pennsylvania Transition Advisory Committee was responsible for developing the Transition section (Standards 342.37) of the Pennsylvania Department of Education Standards and Regulations. These Standards require multi-year planning to begin at age 14 for all eligible special education students. Enforcement of these guidelines is dependent upon Senate Bill 927 which legislates responsibilities of both education and adult service providers in the transition process.

This committee also undertook the development of implementation approaches for transition planning. The resulting four page, multi-year document establishes a longitudinal approach for coordinating client desires with future educational planning and adult services. Specifically, it addresses the desired post-school outcomes of: employment, higher education and training, and residential placement. Also listed here are the services required to meet these goals, in the form of assessment, work experiences and community referenced instruction, as well as areas of support necessary to meet these goals. The final section of this transition planning guide is a follow-up assessment to be completed six months after graduation designed to evaluate the effectiveness of the document and transition plan, and the level of interagency coordination and cooperation.

Although the state committees began their work in 1989, the Allegheny Intermediate Unit had initiated transition activities in 1987 with the development of a handbook for family members titled Transition Planning for Disabled Students. Essentially, the handbook provides family members with a set of "how to" plans for a smooth transition to independent living after the completion of school. It includes a series of questionnaires which parents may utilize in assessing their child's future vocational, residential, medical, legal and personal development needs.

In 1988, every student enrolled in special education programs whose parents attended the annual Individual Education Plan meeting received a copy of this handbook. Additionally, a written pilot transition plan format was developed and implemented for all students registered at the centers who were age 16. Areas of this plan included: educational options, living arrangements, recreation and mobility/transportation issues.

Transition teams were comprised of a combination of students, family members, teachers, vocational instructors, guidance counselors, OVR representatives, Base Service Unit representatives and other members of adults services as mandated by the specific student's needs. These transition plans were to be written for all students age 16 and again at ages 19 and 20 in order to insure an ongoing process of career and futures planning. Districts were instructed to complete this process for those special education students who had returned to their home

schools.

In 1989 the Allegheny Intermediate Unit received funding from the Pennsylvania Department of Education for the development of an exemplary transition model. The purpose of this grant was to provide services above and beyond the already existing transition strategies. This project funded a transition specialist and a job coach to develop transition teams, target classrooms/populations, and activate a tracking system for those students involved in the project. Other key areas included creation of interagency agreements, suggestions for functional curriculum revisions and the development of resource guides. This project was aimed at three of the centers directed by the Intermediate Unit.

The first year of this project produced the following outcomes: an Interagency Advisory Committee comprised of representatives from both education and adult services, and specific transition teams at each of the targeted centers. Services available in Allegheny County were researched and edited into a manual, Parent Directory for Transition Services.

Individual transition plans were completed for each of the students in the targeted classrooms. Eleven of thirteen graduates and their families who desired services received placement into employment and other adult services by the job coach and transition specialist. Inservices were provided for district based personnel on the transition process as well as on the format developed by this project.

In the 1990 school year, targeted classrooms have been expanded to include all six of the AIU center based programs with secondary students. Transition plans will be written for each of these students, age fourteen to twenty-one, with follow-up activities provided by the transition specialist and job coach. The Transition Planning Guide developed by the state level transition committee will be utilized for the first time during this period. Plans are currently underway to enlist greater involvement on the part of parents, employers, adult service providers and the Office of Vocational Rehabilitation with this planning process.